PURSUING FIT: A GROUNDED THEORY OF E-RECRUITMENT IN NAMIBIA – AN INTEGRATED JOBSEEKER AND AGENCY PERSPECTIVE

by

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Thesis Submitted in Fulfilment of the Requirements for the Degree

DOCTOR OF PHILOSOPHY

in the Department of Information Systems

FACULTY OF COMMERCE

at the

UNIVERSITY OF CAPE TOWN

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November 2019

DECLARATION

I hereby declare that

***Pursuing Fit*: A Grounded Theory of E-recruitment in Namibia – An Integrated Job-seeker and Agency Perspective**

is my own work, and all sources have been acknowledged through referencing.

Signed by candidate

M. ABIA

ACKNOWLEDGEMENTS

I am grateful for the superb guidance by my supervisor Professor Irwin Brown. Thank you Professor Brown for the time spend guiding me through this project. My gratitude also goes to Professor Barney Glaser for the books on Grounded Theory Methodology he gave to me in addition to books I bought from him and the research articles he suggested for my reading. My acknowledgements also go to Dr Titus Tossy for the critique of my research scripts and ideas during the proposal writing stages. I thank Professor Mike Hart for proof reading the thesis and his guidance through the proof reading process. Thank you to all members of staff and students in the Department of Information Systems who have shown interest and/or commented on this research. I acknowledge all colleagues, associates and friends who encouraged me during the development of this thesis. Thank you to Maria, Aka, Kuku, Gogo, Too, Shushu, Shongs and family and all other family members who knew about this project and supported it. All thanks to the Mighty Lord, God of all.

ABSTRACT

The purpose of this study was to identify the main concern of jobseekers and recruitment agencies in electronic recruitment (e-recruitment) and determine how it was resolved. The country of Namibia was chosen for the study because many of its jobseekers and recruitment agencies are adopting e-recruitment to overcome challenges in their recruitment context. In order to meet the purpose of the study, Classic Grounded Theory Methodology (classic-GTM) was used. Through the application of classic-GTM it emerged that jobseekers' and recruitment agencies' perspectives on e-recruitment are varied and shifting, which together with the dynamics in information technology bring many possibilities and fluidity of stakeholders' behaviour. Therefore, jobseekers and recruitment agencies are mainly concerned about *Fit* or lack thereof between their conceptualizations of *Objects of Concern* (namely information technology, jobseekers, job providers (recruitment agencies and employers) and jobs) in such a dynamic environment. *Pursuing Fit* emerged as the core variable (core category) representing how the participants continuously resolved their main concern. Two sub-categories constituting *Pursuing Fit* are *Interpreting Fit* and *Positioning for Fit* and they explain how stakeholders interpret e-recruitment concepts and position themselves and other *Objects of Concern* based on interpretation. Recruitment is likely to take place when *Objects of Concern* relate in a desirable (fitting) manner. The study's contribution to knowledge is through the theory of *Pursuing Fit* that suggests a systematic way of understanding e-recruitment and of conceptualizing information technology in e-recruitment to increase chances of recruitment. Implications common for both jobseekers and recruitment agencies are context awareness and flexibility. Context awareness allows stakeholders to interpret *Objects of Concern* based on the context and flexibility makes it possible to change from a previously held position. The study can be used as the foundation for research involving multiple stakeholders in e-recruitment. In conclusion, e-recruitment is a process of meaning creation in which stakeholders interpret concepts and based on the meanings relate the concepts with each other.

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LIST OF ABBREVIATIONS AND SYMBOLS

5G	-	5th Generation
EC	-	Edge Computing
e-HRM	-	Electronic Human Resource Management
E-recruitment	-	Electronic Recruitment
GTM	-	Grounded Theory Methodology
GT	-	Grounded Theory
GIQM	-	Generic Inductive Qualitative Method
IBE	-	Inference to the Best Explanation
ICT	-	Information and Communication Technology
IS	-	Information Systems
IT	-	Information Technology
m-ICT	-	Mobile Information and Communication Technology
QC	-	Quantum Computing
TTF	-	Task-Technology Fit

CHAPTER 1: INTRODUCTION TO THE STUDY

This Chapter starts with an Introduction to the thesis, followed by a discussion on the concept of e-recruitment, motivation for e-recruitment, problems with e-recruitment, research objectives, a brief note on the research methodology and finally the structure of the thesis.

1.1 Introduction

This study focuses on electronic recruitment (e-recruitment) from the perspective of jobseekers and recruitment agencies in Namibia. The study is incentivised by two elements: 1. the need to advance understanding of e-recruitment in developing countries, given its potential to help address problems of high unemployment and scarcity of skills and 2. problems posed by the shift from traditional recruitment to e-recruitment propped by the pervasiveness of mobile information technologies that in the main allow many people access to the Internet in Namibia. The study brings understanding to the phenomenon of e-recruitment from the perspectives of jobseekers and recruitment agencies. Classic grounded theory methodology (GTM) was selected as a suitable methodology to use and the resultant grounded theory (GT) explains the jobseekers and recruitment agencies' main concern (see Chapter 3) and how they resolve it. The outcome of the study is a substantive theory, which will be a theoretical foundation upon which further studies can be done. A literature review is provided initially to contextualize the study (Chapter 2).

1.2 The Concept of E-recruitment

Attempts at defining e-recruitment include viewing it as a process that involves attracting candidates, sorting applicants and making contact using information technologies. Unlike traditional recruitment, e-recruitment makes use of information technology to handle the recruitment processes. Although context affects a recruitment model, Breaugh et al., (2008) define a recruitment model that presents the recruitment process at a macro level as shown in Figure 1.

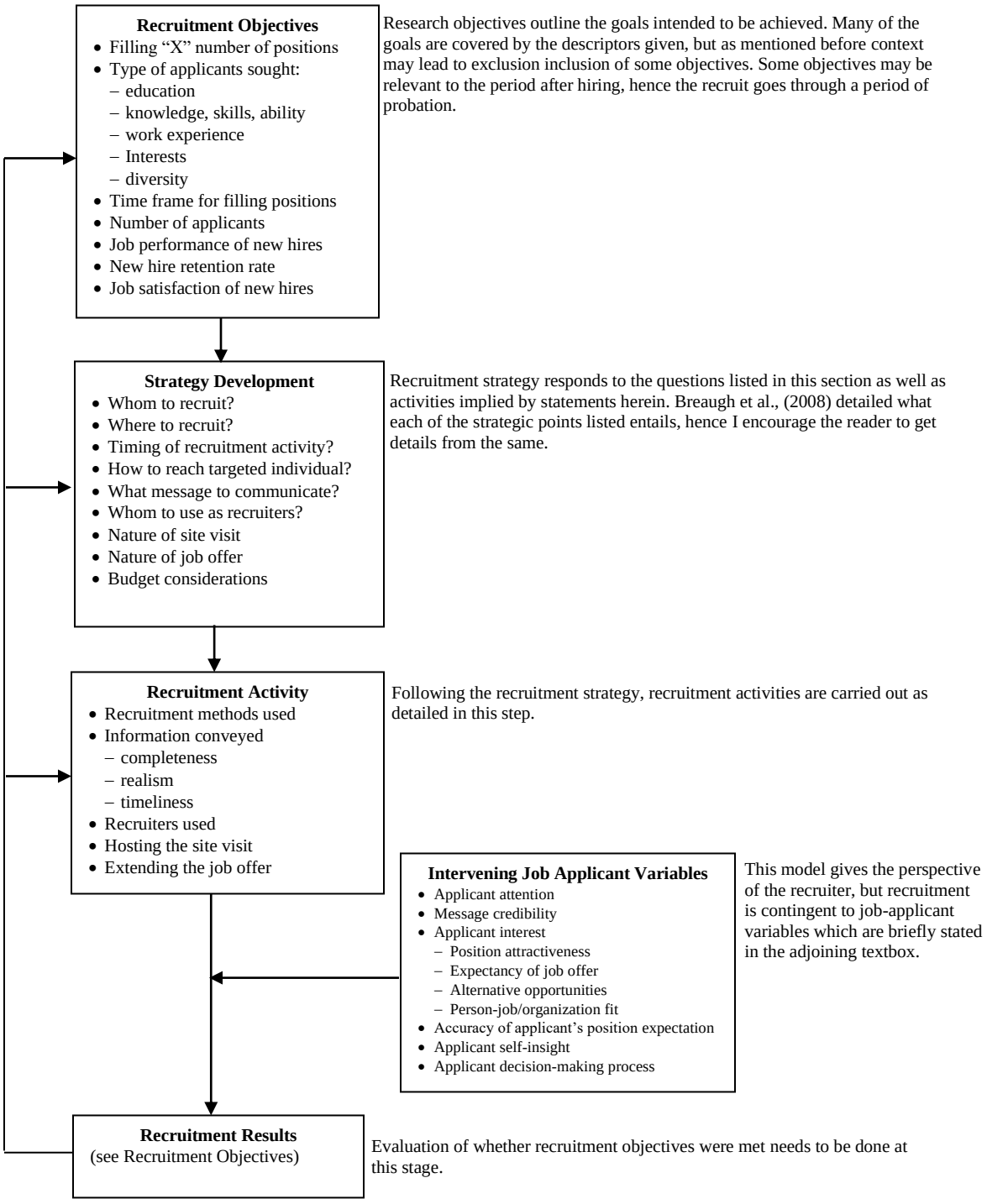


Figure 1: A Model of the Recruitment Process (Breaugh et al., 2008, p. 47)

Setting recruitment objectives, developing a strategy, performing the recruitment activity and obtaining and evaluating recruitment results are all aided by information technology in e-recruitment.

E-recruitment benefits from the growth in mobile phone usage, especially in Africa. “Business leaders and investors did not anticipate that a continent invariably labelled as poor and corrupt would be able to provide the infrastructure and customer base required for considerable market growth. Wedded to mobile phone business models popular in developed countries (based on contracts, sending data, and high-end phones), few realized the potential for growth in Africa along different lines (based on pre-pay phone cards, voice, and low-end phones). In particular, the demand from rural and low-income areas exceeded all expectations.” (Etzo & Collender, 2010, p. 660). Recruiters compete with each other and jobseekers compete for jobs; which drives both groups to adopt information technologies at accelerated rates in order to take the strain out of some of the recruitment activities (Borstorff, Marker, & Bennett, 2007; Cappelli, 2001; Cober, Brown, & Levy, 2004; Pfieffelmann, Wagner, & Libkuman, 2010; Simón & Esteves, 2016; Smyth, Bradley, & Rafter, 2002).

“For most job seekers, the Internet is where the action is.” (Cappelli, 2001, p. 140). Thus, to get good jobseekers recruiters need to move swiftly to locate and hire, which may require hiring agencies to help the recruiters using a multitude of information technologies in the process (Koong, Liu, & Williams, 2002, p. 130). Information technology innovations have generated a big shift in recruitment resulting in the transformation of recruitment activities (Anderson, 2003; Lievens & Harris, 2003), which means research in e-recruitment is necessary.

The evolution in information technology (Solée et al., 2013) and revolution in e-recruitment results in continuous changes in the nature of the substantive area (Lee, 2007). The changes necessitate research into evolving concerns of participants in e-recruitment. This research should align with the shifts in practice (García-Izquierdo, Aguinis, & Ramos-Villagrasa, 2010), in this case e-recruitment practice.

The national labour force can be defined as the pool of people eligible for employment in a country (Jauch, 2012). A jobseeker is someone who is part of the labour force and is searching for work (Steel, 1997, p. 7), and may or may not be currently employed (Broersma, 1997; Fountain, 2005). The unemployment rate refers to the number of unemployed economically active members of the labour force as a proportion of the total economically active labour force (Steel, 1997, p. 7). Some publications define the unemployed individual as one who has been actively seeking employment in a specified period (Steel, 1997). The employed labour force finds itself either in vulnerable employment or in secure employment (Singer, 2013). Vulnerable employment means the employee does not have formal work arrangements with access to social protection facilities (McKay, 2008): many such employees are jobseekers because they would prefer secure employment. Those in secure employment may also participate in the recruitment process as jobseekers in search of better or alternative job opportunities.

A recruitment agency is a third party provider of labour to an employer who is the agency's client (Druker & Stanworth, 2004), and works as an intermediary between the jobseeker and the employer (Eisenhardt, 1989). Recruitment agencies have to customise their services to employers' needs because employers in different contexts or circumstances require different recruitment services (Forde, 2001). Recruitment agencies' reasons for using e-recruitment include the fact that, " …workers and employers are turning to the Internet, both as an information source in itself and as a way to access and transmit information that could also be found offline. The two-sidedness of a labour market means that the strategies and effectiveness of workers' and firms' searching are quite interdependent and should not be examined in isolation." (Fountain, 2005, p. 1237). Rich sources of information are essential in the labour market (Akerlof, 1970), and recruitment agencies play a significant role in providing the required information to both jobseekers and recruiters (Fountain, 2005, p. 1237). The pervasiveness of Information and Communication Technology (ICT) provides an important means to transmit and share information between recruitment stakeholders, even in developing countries like Namibia.

1.3 Motivation for E-recruitment in Namibia

There are at least three factors that motivate the use of e-recruitment in Namibia. The first is the geographic dispersion of the Namibian labour force, which makes traditional approaches to recruitment inefficient and/or ineffective. The second is the pervasiveness of mobile information and communication technologies (m-ICTs) that facilitate e-recruitment by recruitment stakeholders. The third is competition among jobseekers for scarce job opportunities and competition among recruiters for jobseekers with scarce skills. Each of these factors is discussed in detail in the following subsections.

1.3.1 Namibia's Geographically Dispersed Labour Market

Feldman & Klaas, (2002) observed that jobseekers and recruiters are more likely to use e-recruitment when the geographical scope of the job hunt is wide. Namibia's population of approximately two million people (Khatiwada & Silva, 2015) is highly dispersed over the country's land area of 824 292 km^2. There are at least 39 urban centres in Namibia, each with a population between 1000 and 330 000 (Namibia Statistics Agency, 2011), however only the capital city Windhoek (approximately 325 858 people) has a population of over 65000 (Namibia Statistics Agency, 2011). In order to expose the dispersion of Namibian population centres, I considered urban areas because many jobseekers and recruiters are found in urban areas and the Namibia Statistics Agency, (2019) in the Labour Force Survey report showed that a big proportion of the Namibian population (50.1%) resides in urban areas. Additionally, I considered urban centres with populations above 5000 because such a population is a significant concentration of people in lowly populated Namibia. I found 27 such urban areas, with average distances of approximately 606 kilometres from each other (See Table 1).

Name of Urban Area	Population	Average distance from other Urban Areas (km)	Distance to Furthest Urban Area (km)
Arandis	5,214	542	1302
Eenhana	5,528	586	1425
Gobabis	19,101	669	1418
Grootfontein	16,632	475	1268
Helao Nafidi	19,375	645	1395
Karibib	5,132	471	1252
Katima Mulilo	28,362	1098	2027
Keetmanshoop	20,977	886	1693
Khorixas	6,796	479	1273
Lüderitz	12,537	1131	2027
Mariental	12,478	686	1472
Okahandja	22,639	446	1140
Omaruru	6,300	422	1060
Ondangwa	22,822	589	1489
Ongwediva	20,260	567	1392
Opuwo	7,657	644	1491
Oshakati	36,541	614	1524
Otavi	5,242	431	1179
Otjiwarongo	28,249	478	1061
Outapi	6,437	614	1488
Outjo	8,445	453	1134
Rehoboth	28,843	556	1320
Rundu	63,431	662	1560
Swakopmund	44,725	569	1337
Tsumeb	19,275	438	1118
Walvis Bay	62,096	600	1458
Windhoek	325,858	482	1211

Table 1: Urban Population Dispersion According to Last Comprehensive Census (Namibia Statistics Agency, 2011; www.distancecalculator.net; https//distancecalculator.globefeed.com)

The dispersion of communities in Namibia and the need by people to look for better opportunities without incurring high costs motivates the use of m-ICTs in many areas including e-recruitment.

1.3.2 Pervasiveness of Information and Communication Technologies in Namibia

Namibia is witnessing enormous adoption of information technologies in its economic activities (Erastus, Jere, & Shava, 2017; Jackson, Pompe, & Krieshok, 2012). The International Telecommunications Union (ITU, 2017) indicated that Namibia had 104.5 mobile phone subscriptions per 100 people in the year 2017. Like in most Sub-Saharan countries, the adoption started with a mild (brief and limited) association with fixed-line telecommunication infrastructure, which was superseded by mobile information and communication networks (Mothobi & Grzybowski, 2017). The adoption is higher in urban areas than in rural areas (Ngololo, Howie, & Plomp, 2012, p. 12). Table 2 shows means of access to information by the population in Namibia as at 2016. In the past few years there has been an increase in Internet connection by the Namibian population, e.g. 8.8% of the Namibian population had access to the Internet in 2011 (Namibia Statistics Agency, 2011) and this percentage increased to 23.2% by 2016 (Namibia Statistics Agency, 2016) (see Table 2).

Type of ICT Service		Percentage of Total Population	Percentage of Urban Population	Percentage of Rural Population
Radio	Owns	45.6	37.8	54.7
	Has access	23.7	25.9	21.1
Fixed-line phone	Owns	4.9	8.2	1.0
	Has access	9.1	12.3	5.2
Television	Owns	42.5	63.8	17.4
	Has access	11.8	10.3	13.5
Cell phone	Owns	93.3	97.2	88.9
	Has access	2.5	0.9	4.3
Internet connection	Owns	15.0	-	-
	Has access	8.2	-	-
Newspaper	Daily readership	21	-	-

Table 2: Means of Access to Information (Namibia Statistics Agency, 2016; The Namibian, 2018)

Although the percentage of people with daily and weekly access to the Internet as at 2016 was low, the percentage of people with mobile phones was over 90% of the total population (Table 2) and given that many of the mobile phone owners were not on an Internet-enabled mobile phone, it was just a matter of time before they acquired Internet-enabled mobile phones. Recent statistics indicate that approximately

28% of all mobile network connections in Namibia are by smart phones (Namibia Statistics Agency, 2017) and in Sub-Saharan Africa that statistic is 34% and predicted to reach 68% by the year 2025 (GSM Association, 2018). These statistics indicate the level of adoption of smart phones and more adoption increases e-recruitment possibilities available to large sections of the population.

However, the evolving nature of the digital divide (Paul, 2016; van Deursen & van Dijk, 2011) has an effect on access to e-recruitment regardless of access to suitable Internet-capable devices. The original digital divide was based on physical access to a computer and then it was based on access to the Internet (Rowsell, Morrell, & Alvermann, 2017; van Deursen & van Dijk, 2011). The digital divide can be between individuals, geographic regions or any other unit suitable for the purpose of a study (Philip, Cottrill, Farrington, Williams, & Ashmore, 2017). The digital divide in general and between generations in particular is a complex issue (Yu, 2011, p. 672). Populations that are geographically distant from centres of technology sometimes do not get access to information technologies (Rowsell et al., 2017) resulting in them getting less access to information. The consequence of the digital divide is information inequality and information is essential for jobseekers and recruiters. Digital skills might also be lacking.

There is debate around the nature and measurement of digital skills, despite the relevancy of such skills in e-recruitment. There are numerous studies on skill set, experience and training of recruiters (Breaugh, 2008, p. 111), but there is a general problem of lack of clarity on definition and measurement of digital skills of recruiters and job seekers (Hargittai & Hsieh, 2012, p. 95). Varying definitions and measures have been proposed but only a few have been tested (van Deursen & van Dijk, 2010), but going by many of the definitions there is evidence that there is scarcity of digital skills in developing countries. Research advises e-HRM (Electronic Human Resource Management) practitioners to enhance their technical knowledge and skills (Holm, 2012). Ghazzawi and Accoumeh, (2014) note that successful e-recruitment

demands that recruiters have high information technology skills, and interpersonal skills. Lack of skills, motivation or resources are a contributing factor to a digital divide (Yu, 2011) and many jobseekers are digitally excluded because they have limited information technology skills (Lindsay, 2005), which they need to take part in e-recruitment (Holm, 2014).

1.3.3 Jobseekers' Competition for Fitting Jobs and Recruiters' Competition for Skilled Jobseekers

In Namibia, e-recruitment is motivated by jobseekers' competition for the few fitting jobs and recruiters' competition for skilled jobseekers. Jobs for which there are more qualified jobseekers than there are vacancies results in competition amongst the jobseekers. E-recruitment helps jobseekers broaden their search in an attempt to gain competitive advantage (Khan, Taha, & Ghourl, 2011; Sylva & Mol, 2009). There are jobs for which recruiters find it difficult to source skilled employees and they use e-recruitment to cast their search wide in order to increase chances of attracting suitably skilled jobseekers (Williamson, King, Lepak, & Sarma, 2010). Girard and Fallery, (2009) note that e-recruitment also allows recruiters to make geographically broad searches for employees with ease and at reasonable cost. These sought after competitive advantages motivate jobseekers and recruiters to use e-recruitment in Namibia.

1.4 Problems with E-recruitment

E-recruitment has a problem of having a variety of definitions, which is expected because it is part of e-HRM (electronic Human Resource Management) that has different definitions depending on the context (Bondarouk, Parry, & Furtmueller, 2017, p. 98; Simón & Esteves, 2016, p. 26). This variety includes viewing e-recruitment as a technology tool, e-recruitment as a system, e-recruitment as a process, e-recruitment as a service and e-recruitment as a proxy (see Section 2.3 and Table 3 for details and references). Although the variety of definitions may allow researchers to choose a definition suitable for their context of study, these studies tend to reveal overlapping and contradictory results due to the overlaps or differences in definitions (Bondarouk et al., 2017, p. 100). This variety of definitions are an indicator of what Marler and Fisher (2013, p. 34) refer to as a lack of a strong theoretical foundation in e-

HRM research in general.

Khan, Taha and Ghouri (2011) note that many studies on e-recruitment focus on one e-recruitment stakeholder at a time and few studies focus on a combination of stakeholders. While understanding e-recruitment from one stakeholder's perspective is helpful, it is equally important to understand e-recruitment from the combined perspectives of multiple stakeholders (Allden & Harris, 2013, p. 39) because e-recruitment is a process with multiple stakeholders.

1.5 Research Objectives and Questions

The discussion above indicates that there are mixed views on e-recruitment due to many factors, including lack of a basket of theories to guide practice and research. Perspectives on e-recruitment come from a variety of stakeholders, therefore it is essential to consolidate their concerns in research and practice, therefore, the objectives are:

1. to identify the main concern (See Chapter 3) of jobseekers and recruitment agencies in e-recruitment in Namibia and

2. to understand how the concern is processed and resolved by jobseekers and recruitment agencies.

The concept of main concern refers to a matter that troubles participants the most about/within the studied phenomenon. Chapter 3 explains more on the concept of the main concern. The corresponding research questions are:

1. What is the main concern and sub-concerns of jobseekers and recruitment agencies in e-recruitment in Namibia?

2. How is the concern processed and resolved by jobseekers and recruitment agencies in e-recruitment in Namibia?

This study will meet these objectives and research questions by generating a theory that explains the process of e-recruitment from the perspectives of jobseekers and e-recruitment agencies in Namibia. Such a theory will provide me with grounds for reasoning about e-recruitment processes and inform people's engagement with e-recruitment since according to Colquitt and Zapata-Phelan, (2007), theory enables stakeholders to understand phenomena of interest.

1.6 Research Methodology

Given the objectives, classic-Grounded Theory Methodology (classic-GTM) is deemed suitable for this study as detailed in Chapter 3. It is common in GTM use that concerns and sub-concerns and how they are resolved are the basis for developing theory (Adolph et al., 2012). I use the literature to contextualise the study and the phenomenon of e-recruitment (see Chapter 2), but not as a means to develop pre-conceived notions of what the stakeholder concerns and their resolution might be, since in GTM studies these must emerge from the data.

1.7 Structure of the Thesis

The main body of the thesis has the following chapters:

Chapter 1: introduces the reader to the study, and introduces e-recruitment as the phenomenon studied, it then outlines motivation for e-recruitment, problems with e-recruitment, and objectives of the research, brief discussion on research methodology and structure of the thesis.

Chapter 2: As is generally conventional in classic-GTM research, the chapter does not provide a traditional literature review; instead, it provides a contextualization literature review.

Chapter 3: provides details of the classic-GTM research design used in the study. It discusses the philosophical position adopted, research methodology, quality criteria for the research process, data collection, data analysis, and ethics issues in the study.

Chapter 4: details findings based on jobseeker data.

Chapter 5: details findings based on recruitment agency data.

Chapter 6: Analyses findings from Chapters 4 and 5 resulting in a comprehensive discussion of the core category (*pursuing fit*).

Chapter 7: integrates *pursuing fit* with theories in extant literature.

Chapter 8: discusses evaluation of the study. Among other discussions, it checks if the objectives of the study were met, discusses evaluation of the GTM process used and evaluation of *pursuing fit*. The chapter discusses other contextual issues related to the study.

Chapter 9: details the contribution, implications of the study and possible further research ensuing from this study.

References and Appendices: The thesis document ends with references and appendices relevant for the research.

CHAPTER 2: E-RECRUITMENT LITERATURE REVIEW

2.1 Introduction

This chapter aims at contextualizing the study and starts with an introduction to the chapter, that is followed by:Purpose of the Literature Review in Classic-GTM, Identifying and Conceptualisation of E-recruitment, Role of the IT Artefact in E-recruitment, Emerging Literature and Evolving E-recruitment, E-recruitment Adoption by Jobseekers and Recruitment Agencies, Benefits and Challenges in E-recruitment, Characteristics of the E-Recruitment Literature and a Summary of the Chapter.

2.2 Purpose of the Literature Review in Classic-GTM

Christensen (2011, p. 21) outlines the importance of a literature review in a classic GTM study in the statement, "The place and purpose of the literature review in a Classic (Glaserian) Grounded Theory (CGT) study is to situate the research outcome within the body of previous knowledge, and thus to assess its position and place within the main body of relevant literature." Contextualisation of this study will result in the following:

- delimiting the context of the study,
- clarity on the meaning of e-recruitment based on literature, and
- illumination of the gaps in e-recruitment research.

In order to achieve this contextualization, a comprehensive search for literature was done (see Appendix K) following and building on guidelines from Webster & Watson (2002, pp. xv–xvi), Levy & Ellis (2006, pp. 189–192), Wolfswinkel et al. (2010) and others, which yielded conceptually relevant literature on e-recruitment. (See Appendix K for details of search and selection stages of the review). E-recruitment is viewed from a number of perspectives by stakeholders. E-recruitment involves a number of people, organizations and IT (Information Technology) artefacts. While recruitment is an old concept, the use of IT artefacts in recruitment brings in a new dimension to traditional recruitment (Sylva & Mol, 2009). Many studies focus on relations between some stakeholder and the IT artefact in e-recruitment e.g.

applicant experience with online recruitment (Feldman & Klaas, 2002) or website viewer's perception (Braddy, Meade, Michael, & Fleenor, 2009). Stakeholders in e-recruitment include jobseekers, recruiters, personnel marketers, recruitment agencies, e-recruiting platform analysts, researchers and designers (Wolfswinkel et al., 2010).

2.3 Identifying and Labelling of Conceptualisations of E-recruitment

Although many studies have focussed on e-recruitment, there are shortcomings on its conceptualization and no labels for the conceptualisations when they are implied. There are offers in literature on conceptualization of what e-recruitment is, its effects and its implications in organizations and societies, but these have not been clearly labelled and made topical in the discussions. Furtmueller (2013); Maurer & Cook, (2011) and others view e-recruitment from the perspective of information technology artefacts used and define it as a recruitment process primarily enhanced by electronic tools. Other studies focus on specific information technologies e.g. the Internet (Braddy et al., 2009; Parry & Tyson, 2008) as a indispensable component of e-recruitment.

The identification of alternative conceptualisations of e-recruitment in literature was carried out after the fashion of Orlikowski & Iacono, (2001) who reviewed Information Sysems literature to identify several views of the IT artefact, i.e. nominal view, computational view, tool view, proxy view and ensemble view. Boell & Cecez-Kecmanovic (2015) in like manner identify several views of Information Sytems, i.e. technology view, social view, socio-technical view, process view and sociomaterial view. The latter sociomaterial view challenges researchers not to insist on separation of the technical from the social because the two are inherently inseparable (Orlikowski & Scott, 2008). I investigated conceptualizations of e-recruitment in the literature further. Five conceptualizations or views on e-recruitment were identified and for the purpose of this study, labelled as: e-recruitment as a Technology Tool, E-recruitment as a System, E-recruitment as a Process, E-recruitment as a Service, and E-recruitment as a Proxy. Table 3 describes the five conceptualizations and gives a list of representative articles for each. It

needs to be noted that some research uses multiple conceptualizations of e-recruitment e.g. Lee (2011), wherein e-recruitment is viewed as a system and as a process. Many of the articles did not explicitly state their espoused conceptualization of e-recruitment, it was only after reading through the article that the implied conceptualization became apparent. In many cases conceptualization of e-recruitment was closely linked to conceptualization of the associated IT artefact.

Conceptualization of E-recruitment (Label assigned in this study**)**	**Description**	**Articles**
1. E-recruitment as a *Technology Tool*	E-recruitment is viewed in some studies as a technology tool.	Faliagka et al. (2012)
2. E-recruitment as a *System*	E-recruitment is a group of independent but interrelated elements comprising a unified whole. These elements include technology, society, organizations, etc.	Chiwara et al. (2017); Lee (2007, 2011); Yoon Kin Tong (2009); Faliagka et al. (2012); Braddy et al. (2003); Pavon & Brown (2010)
3. E-recruitment as a *Process*	E-recruitment is a set of systematic well-coordinated activities. The activities are done by information technology or traditionally in comination with information technology.	Lee (2007); Lee (2011); Ehrhart et al. (2012); Feldman & Klaas (2002); Parry & Tyson (2008); García-Izquierdo et al. (2010); Kashi & Zheng (2013); Jansen et al. (2005); Smith & Rupp (2004); Llorens (2011)
4. E-recruitment as a *Service* a. E-recruitment as a Repository b. E-recruitment as a Medium c. E-recruitment as a Program (E-recruitment as an Implemented Algorithm)	E-recruitment is a service to recruitment. It cannot be entrusted to do all that is needed for successful recruitment, therefore it only provides certain functionalities. a. E-recruitment provides storage facilities for recruitment data. b. E-recruitment is a communications conduit between stakeholders in recruitment. c. E-recruitment is a set of precise rules for solving a problem.	Koch et al. (2018); Smyth et al. (2002); Vidros et al. (2016) a. García-Izquierdo et al. (2010); Wang & Guo (2012); Llorens (2011) b. Bartram (2000); Feldman & Klaas (2002); Selden & Orenstein (2011); Sylva & Mol (2009); Van Hoye & Lievens (2007) c. Lee (2007); Jansen et al. (2005); Faliagka et al. (2012)
5. E-recruitment as a *Proxy*	E-recruitment acts on behalf of organizational and societal entities.	Braddy et al. (2009); Jansen et al. (2005); Walker et al. (2011)

Table 3: Conceptualizations of E-recruitment

1. **E-recruitment as a Technology Tool:** E-recruitment as a technology tool is a conceptualization of e-recruitment as a means to apply science to industry, commerce or society. This means is demonstrated by Faliagka et al. (2012) who presented a tool to automate the ranking of applicants in recruitment.

2. **E-recruitment as a System:** Studies that view e-recruitment as a system conceptually divide e-recruitment into independent but interrelated elements, at the core of which is information technology, society, organizations, etc. The system view allows each component to receive input from the other elements and produce input for other components (Lee, 2007). Chiwara et al. (2017) indicate that the system view of e-recruitment assigns all automating functions to the IT artefact of the system while organizational recruitment experts evaluate the outcome. While some stakeholders view e-recruitment as a system, others view it as a process.

3. **E-recruitment as a Process:** Instead of focusing on entities, the process view of e-recruitment focuses on e-recruitment activities and determines that they are systematic and well-coordinated. There is no attempt to set boundaries between the IT artefact, society and organization, but activities are clearly identified and can be performed by either the IT artefact or traditionally. García-Izquierdo (2010) focus on the data collection activity which in the study was done using an online system, however it needs to be noted that it could be done traditionally. Llorens (2011) indicates that recruitment activities can either be performed electronically or traditionally. In the process view of e-recruitment the end goal is the execution of all the recruitment activities.

4. **E-recruitment as a Service:** The view exists that e-recruitment is a service to recruiters and jobseekers. Many e-recruitment platforms are independent of the organizations or societies they serve (Smyth, Bradley & Rafter, 2002) and are viewed as belonging to the "Internet". Sub-views of e-recruitment as a service include: **E-recruitment as a Repository**, **E-recruitment as a Medium**, **E-recruitment as a Program**.

E-recruitment as a Repository: Some studies portray E-recruitment as a Repository for data about

jobseekers, jobs, recruiters and employers. Wang & Guo (2012) wanted to investigate the correlation between a company's recruitment data and its performance, and e-recruitment provided them with the data. In a study by García-Izquierdo et al. (2010) online forms were filled in by jobseekers and the data provided on the forms was stored for recruiters and other stakeholders to retrieve. While the view of e-recruitment as a repository is usually held when e-recruitment is newly adopted, other services follow suit.

E-recruitment as a Medium is another view held in studies, e.g. Bartram, (2000) portrays e-recruitment as a facilitator of communication between jobseekers and organizations. Traditional media like newspaper (Selden & Orenstein, 2011) are sometimes found inconvenient thus e-recruitment takes their place. Some organizations employ e-recruiters who form part of e-recruitment and serve to link the IT artefact and other elements in recruitment. Although e-recruitment as a medium improves communication speed it also comes with disadvantages, information overload being one (Smyth et al., 2002).

E-recruitment as a Program is a view that associates e-recruitment with calculations and logical interpretation and processing of data. In defining a holistic e-recruitment system Lee (2007) includes, as an algorithmic module, a Pre-screening Management System to automatically assess the extent of match between an applicant's qualification and job requirements. Such module or similar modules are found in many e-recruitment systems given the high volumes of applications associated with e-recruitment. Therefore, many studies espouse the view that e-recruitment serves to provide a convenient algorithmic matching service.

5. **E-recruitment as a Proxy:** Some studies view e-recruitment as acting on behalf of other entities. The view that information technology and those few working closely with it are performing similar tasks in organizations is a long held perspective (Jarrahi, 2018), however e-recruitment goes beyond that because it has by-products in its functionalities like presenting the image of the company, culture of

the company, etc. Braddy et al. (2009) examined the effects of website content features on people's perceptions of organizational culture. Their study implies that e-recruitment, especially the IT artefact (website) acts on behalf of some corporate image management entity in the organization. While Braddy et al. (2009) focussed on website content, Walker et al. (2011) focussed on website characteristics for the same. E-recruitment as a Proxy is not surprising because the IT artefact is at the centre of e-recruitment and Orlikowski & Iacono (2001) detailed one conceptualization of the IT artefact as a proxy.

2.4 Role of the IT Artefact in E-recruitment

A number of roles of the IT artefact in e-recruitment are apparent. Four roles were evident through analysis of the literature, these being **Recruitment Task Processor**, **Image Portrayal**, **Security Tool** and **Networking Tool**. Descriptions of the roles are given in Table 4, together with articles associated with the roles.

Role of IT Artefact in E-recruitment	Description	Sample Articles
1. Recruitment Task Processor	The artefact performs recruitment tasks. Many of the artefacts are websites with backends to respond to and to generate queries.	Bartram (2000); Chiwara et al. (2017); Ehrhart et al. (2012); Faliagka et al. (2012); Feldman & Klass (2002); Garcia-Izquierdo et al. (2010); Jansen et al. (2005); Kashi & Zheng (2013); Koch et al. (2018); Lee (2007); Llorens (2011); Parry & Tyson (2008); Pavon & Brown (2010); Selden & Orenstein (2011); Smith & Rupp (2004); Smyth et al. (2002); Sylva & Mol (2009); Yoon Kin Tong (2009)
2. Image Portrayal	Through its characteristics, content, etc the artefact portrays an image of itself, organization, or any other entity it is perceived to represent.	Braddy et al. (2003); Braddy et al. (2009); Ehrhart et al. (2012); Kashi & Zheng (2013); Van Hoye & Lievens (2007); Walker et al. (2011)
3. Security Tool	The IT artefact plays the role of a security tool when it is used to protect the privacy and confidentiality of users.	Feldman & Klass (2002); Vidros et al. (2016); Wang & Guo (2012)
4. Networking Tool	Jobseekers and organizations use the IT artefact to establish networks. Some online artefacts like www.linkedIn.com have been enabling the formation and use of networks for some time now.	Koch et al. (2018); Lee (2011)

Table 4: Roles of the IT Artefact in E-recruitment

1. **Recruitment Task Processor:** Recruitment tasks, including creation of job adverts, and identification of suitable candidates are sometimes done using e-recruitment systems (Koch et al., 2018). One of the tasks detailed in Koch et al. (2018) is personality mining, which they give details on. Online application procedures are tasks that e-recruitment has to be part of (Sylva & Mol, 2009). Parry & Tyson, (2008) note that websites are used to distribute job advertisements to jobseekers. Many stakeholders view the role of the e-recruitment IT artefact as one responsible for processing recruitment tasks, however others have different perspectives.

2. **Image Portrayal:** Ehrhart et al. (2012) take a broad view to conceptualizing organizational image as general impressions of the organization's attractiveness, and perception of a given organization by the public. Kashi & Zheng (2013) note that jobseekers' impressions of the organizational website could create interest in the organization as an employer, while Braddy et al. (2009) observe that culture characteristics are portrayed by website content features. Walker et al. (2011) view website characteristics as antecedents of the jobseekers' image of the organization.

3. **Security Tool:** E-recruitment systems attract the attention of scammers whose intention is to steal personal information, inflict economic damage and harm the reputations of e-recruitment and its providers (Vidros et al., 2016). Feldman & Klaas (2002) also point out security of personal information as a major issue in e-recruitment. To counter this, some e-recruitment systems are incorporating bot detection systems e.g. Captcha to ensure that robots do not compromise their e-recruitment systems (Vidros et al. 2016).

4. **Networking Tool:** Networking is essential in e-recruitment, therefore Lee, (2011) observe that online social networking has been incorporated into organizational e-recruiting strategy and is an effective method to examine information provided by job candidates, and to head hunt. In the same vein Koch et al. (2018) investigate the impact of social media on e-recruitment, and observe that LinkedIn was preferred more than Facebook or Twitter in South Africa. Jobseekers provide their

details to recruiters and thus become part of the recruiter's network with the hope that when opportunities arise they will be communicated with.

2.5 Emerging Literature and Evolving E-recruitment

The continued development of e-recruitment is accompanied by evolution in literature. There are a number of recent developments in e-recruitment, and this section discusses three of the ones that are gaining traction and the discussion focusses on their nature as presented in literature. The three are: day labour recruitment and information technology, digital labour, and crowd sourcing. Although day labouring has been in existence in the absence of information technology there are elements in it that came with the introduction of information technology. And while day labouring traditionally associates with traditional (mostly manual) jobs, digital labouring happens online and is highly associated with crowd sourcing in finding tasks and digital labourers.

2.5.1 Day Labour Recruitment and Information Technology

The use of information technology in day labouring disrupts the traditional phenomenon of day labour recruitment. Traditionally, day labourers congregate at informal pickup points to seek for work for a day or part of the day (Schenck, Xipu, & Blaauw, 2012). Studies by Schenck & Blaauw, (2008) and Harmse et al. (2009) show that the majority of day labourers are young males below the age of 30 years. In Southern Africa, specifically in South Africa Theodore et al. (2015) put the percentage of male day labourers at 96%. Day labourers are usually low skilled (Blaauw, Louw, & Schenck, 2006; Theodore et al., 2015) and in addition to hazardous and outright dangerous jobs, they get jobs like garbage collection, distribution of pamphlets, loading and offloading trucks, shelf packing, etc. (Schenck et al. 2012). Schenck et al. (2012) identified pickup points for day labourers at conspicuous locations e.g. along main roads, parking areas, street corners and factory gates. Research has shown that it is usually tough to compete for jobs at these places and in patriarchal societies (e.g. Namibia) Branch (2007), Ramphele (1989), and Wooten and Branch (2012) note that women are usually not afforded equal access to

opportunities. Instead woman take up day labour jobs like house-keeping and child-care (Kennedy, 2010) that call for the employer's persistent trust in the day labourer hence house-keeping and child-keeping day labourers are not usually picked up at pickup points. Aside from word-of-mouth referrals for jobs demanding high levels of trust websites like www.gumtree.co.za, and www.grafternow.com come to mind, and day labourers visit them when they can afford it because as Pavon & Brown (2010) note, access to the Internet is costly in developing countries, thus only a few day labourers visit websites. On the websites, reviews of day labourers by former employers sometimes help potential employers make decisions. As highlighted earlier day labourers are likely to be unskilled or semi-skilled, on the other hand digital labourers tend to be skilled and they tend to do their work online.

2.5.2 Digital Labour

Digital labour is a new phenomenon attracting the attention of industry, commerce, society and scholars who generate literature. Fuchs & Sevignani (2013) describe digital labour as the creation of value on online platforms by users who engage in online activities. While these users are recruited using several means they are sometimes not remunerated, and the lack of remuneration is due to digital labour recruiters promoting the misunderstanding that digital labour is not work but fun (Chen, 2014). However, in other cases digital labourers are remunerated because they are classic workers who happen to have adopted digital labouring in their realm of work (Xia, 2014). Amazon Turk (MTurk) is an example of a website that facilitates digital labour by bringing together people and tools that enable task creation, labour recruitment and compensation among other activities. The recruitment of digital labourers and acquisition of tasks is done through the process of crowd sourcing.

2.5.3 Crowd Sourcing

Carusi et al. (2018) record crowd sourcing as recruiting digital workers and/or communities to share a task or tasks. Jarret & Blake (2015) mention that the tasks are also crowd sourced just as the workers. Thus one set of a crowd provide digital labourers and another set of the crowd provides tasks (Aris, Janom, Arshad, Salleh, & Mastuki, 2013). While crowd sourcing is sometimes event-centric (e.g.

response to a disaster) it is usually an ongoing phenomenon (Dittus, Quattrone, & Capra, 2017). Dittus et al. (2017) give an example of an earthquake disaster in Nepal in 2015 when humanitarian teams needed updated maps of the disaster area and mapping volunteers were crowd sourced resulting in urgent production of the maps. Ongoing crowd sourcing usually involves hiring of digital labourers who are remunerated by task providers. As new trends in e-recruitment phenomenon and literature develop, the core and conventional aspects of it continue to be adopted by both jobseekers and recruiters.

2.6 E-recruitment Adoption by Jobseekers and Recruiters

Adoption of e-recruitment is a key theme in many studies. A number of factors are associated with the adoption of e-recruitment by jobseekers and recruiters (Pavon & Brown, 2010). Perceived ease of use, performance expectancy, perceived usefulness, perceived privacy risk, and application-specific self-efficacy and others are factors relevant to the adoption of e-recruitment information technologies, as seen in Table 5.

Factors Affecting Adoption of E-recruitment	Jobseekers	Recruiters	Representative Articles from the Sample
Perceived ease of use (Effort Expectancy)	X	X	Kashi & Zheng (2013); Yoon Kin Tong (2009)
Perceived usefulness	X	X	Kashi & Zheng (2013); Yoon Kin Tong (2009)
Performance expectancy	X	X	Chiwara et al. (2017); Pavon & Brown (2010); Yoon Kin Tong (2009)
Performance expectancy of newspaper	X	X	Pavon & Brown (2010)
Perceived privacy risk	X	X	Chiwara (2017); Yoon Kin Tong (2009)
Trust in Internet (e-recruitment tool)	X	X	Pavon & Brown (2010)
Application-specific self-efficacy	X	X	Yoon Kin Tong (2009)
Behavioural intention to use	X	X	Kashi & Zheng (2013); Pavon & Brown (2010); Yoon Kin Tong (2009)
Jobseeker income	X		Pavon & Brown (2010)
Newspaper reading habits	X		Pavon & Brown (2010)
Internet usage habits	X		Pavon & Brown (2010)
Internet facilitating conditions	X	X	Pavon & Brown, (2010)

Factors Affecting Adoption of E-recruitment	Jobseekers	Recruiters	Representative Articles from the Sample
Impressions of Website	X	X	Kashi & Zheng (2013)
Impressions of Hiring Organization	X	X	Kashi & Zheng (2013)

Table 5: Factors Affecting Adoption of E-recruitment by Jobseekers

Each of these factors and their implications for e-recruitment adoption will be discussed in turn:

Perceived Ease of Use (Effort Expectancy): is the extent to which a jobseeker believes the use of an e-recruitment tool would be free of effort (Kashi & Zheng, 2013). If the jobseeker perceives an e-recruitment tool as easy to use then the jobseeker is likely to adopt the tool (Kashi & Zheng, 2013).

Perceived Usefulness: is the extent to which a potential e-recruitment tool user believes that using the tool would enhance his or her performance (Yoon Kin Tong, 2009). If the jobseeker perceives the e-recruitment tool as an enhancement to his/her recruitment tasks then he/she will adopt it (Kashi & Zheng, 2013).

Performance Expectancy: This factor is broad in scope, as it includes (is similar to) perceived usefulness, and outcome expectations (Pavon & Brown, 2010; Venkatesh, Morris, Davis, & Davis, 2003). The jobseeker who expects e-recruitment to perform well for them is likely to adopt e-recruitment (Agarwal, Sambamurthy, & Stair, 2000).

Perceived Privacy Risk: is the extent of privacy risk associated with use of the e-recruitment tool as evaluated by the potential adopter (Tong, Duffy, Cross, Tsung, & Yen, 2005). This is closely linked to, if not synonymous with, trust (Chiwara et al., 2017; Pavon & Brown, 2010). If the level of perceived risk is low potential users of the e-recruitment tool tend to trust and possibly adopt the tool (Chiwara et al., 2017).

Trust in E-recruitment: refers to a jobseeker's measure of faith in the extent to which e-recruitment will protect his/her safety, dignity and privacy (Chiwara et al., 2017; Pavon & Brown, 2010). If trust is high

the jobseeker is likely to adopt e-recruitment (Chiwara et al., 2017).

Application-Specific Self-Efficacy: refers to the jobseeker's perception of his/her proficiency in using e-recruitment tools; the jobseeker who perceives himself/herself as proficient in the use of e-recruitment tools is likely to adopt the tools (Yoon Kin Tong, 2009). Application-specific self-efficacy is part of computer self-efficacy, which relates to computer literacy (Dasgupta, Agarwal, Ioannidis, & Gopalakrishnan, 1999).

Behavioural Intention to Use: When the jobseeker's behavioural intention to use e-recruitment is high the possibility of adopting e-recruitment is high (Kashi & Zheng, 2013). There is a high chance that a potential information system user who intends to adopt an information system will adopt it (Mathieson, 1991).

Jobseeker Income: Expenses associated with using e-recruitment can also determine whether a jobseeker adopts e-recruitment or not (Pavon & Brown, 2010). Roos & Jordan (2006) determined that Internet usage is dependent on wages and salaries aside from access to Internet gadgets like computers and smart phones. Although Roos & Jordan's (2006) study was based in South Africa, the same can be said about Namibia given the two countries' shared history and ongoing economic and Internet infrastructure relations.

Newspaper Reading Habits: If newspaper reading habits are strong in jobseekers, adoption of e-recruitment is less likely (Pavon & Brown, 2010). For disseminating information, newspapers are an alternative to information technologies and they have been in use for many generations in Southern Africa (Nengomasha, Uutoni, & Yule, 2012). Aside from the long-standing relations between newspapers and the populace, governments subsidise the price of newspapers under their publishing houses so that as many people as possible have access to them. This is not surprising as governments will be trying to inform the nation of its programs and other related information through familiar channels like newspapers.

Performance Expectancy of Newspaper: Jobseekers will continue using newspapers if the performance gained from newspapers is high, otherwise jobseekers may adopt alternative means like e-recruitment (Pavon & Brown, 2010). In Namibia, physical newspaper readership has been decreasing over the years as an increasing number of people gain Internet access (Remmert, 2019).

Internet Facilitating Conditions: The jobseeker who has enabling conditions to access the Internet will likely adopt e-recruitment (Pavon & Brown, 2010). Thus, if the jobseeker or recruitment agency already has access to Internet-enabled devices (e.g. smart phones and computers) and the Internet, then the chances of that jobseeker adopting e-recruitment are high. Smart phones are owned by at least 28% of the Namibian population (Namibia Statistics Agency, 2017, p. 65) and Remmert (2019, p. 23) notes that at least 27.9% of the Namibian population own or have access to a computer, and at least 23.2% have access to the Internet.

Internet Usage Habits: The frequency of Internet use by a jobseeker gives an indication of whether the jobseeker will adopt e-recruitment or not (Pavon & Brown, 2010). The Namibia Statistics Agency, (2017, p. 66) indicates that in Namibia, at least 19.4% of the population have access to and use the Internet and urban areas have a higher percentage, with at least 31.1% of the urban population having access to and using the Internet. However, Internet usage alone is not an indication of whether e-recruitment will be adopted.

Impressions of Website: Jobseekers interpret the website as a representation of the recruiting organization. If the website gives a good impression, jobseekers are likely to be attracted to the organization (Kashi & Zheng, 2013).

Impressions of Hiring Organization: If jobseekers view the hiring organization favourably then they are likely to engage in the recruitment process with the organization (Kashi & Zheng, 2013). Jobseekers' conception of the hiring organization influences whether they will adopt the organization's e-recruitment tools and procedures (Braddy et al., 2003).

2.7 Benefits and Challenges in E-recruitment

In this section I discuss the benefits (Table 6) and challenges (Table 7) in e-recruitment. Jobseekers, recruiters and other recruitment stakeholders benefit from e-recruitment (Allden & Harris, 2013; Bondarouk et al., 2017; Furtmueller, Wilderom, & Tate, 2011; Girard & Fallery, 2009; Hogan, 2017; Kinder, 2000; Melanthiou, Pavlou, & Constantinou, 2015; Parry & Wilson, 2009; Pavon & Brown, 2010; Wolfswinkel et al., 2010). E-recruitment improves efficiency of several activities in the recruitment process (Furtmueller et al., 2011; Lee, 2007). Substantial financial and time savings result from using e-recruitment when compared with using traditional recruitment (Cappelli, 2001; Faliagka et al., 2014; Freeman, 2002; Lievens & Harris, 2003; Sylva & Mol, 2009). E-recruitment tools support jobseekers' efficiency in their job searches and are available at any time of the day (Van Rooy, Alonso, & Fairchild, 2003), as well as improving staffing efficiency for organizations (Maurer & Cook, 2011; Ployhart, 2006; Thomas & Ray, 2000). There is flexibility associated with e-recruitment in that jobseekers can apply at anytime from anywhere (Melanthiou et al., 2015). Recruiters are able to increase their reach in search of employees (Thomas & Ray, 2000). E-recruiting decentralises the recruiting function for both the jobseekers and recruiters, which means more recruitment participants will be able to be part of the recruitment process (Cappelli, 2001; Sylva & Mol, 2009). Information asymmetry between jobseeker and recruiter is reduced or eliminated in e-recruitment; the jobseeker becomes more knowledgeable about the recruiter and the recruiter can get as much information about the jobseeker as necessary (Lee, 2011). Added to benefits of conventional e-recruitment tools are benefits to the diligent use of social networking sites (Broughton, Foley, Ledermaier, & Cox, 2013), even though there are incumbent risks as outlined in the section above. By using social networking websites and tools, recruiters may be able to avoid hiring job seekers with deviant behaviour (Vicknair, Elkersh, Yancey, & Budden, 2010) and jobseekers are able to avoid recruiters with less favourable profiles (Ram, 1992; Skarlicki, Barclay, & Pugh, 2008). The use of properly designed e-recruitment tools can eliminate undesirable human factors like bias, discrimination and prejudice in the recruitment process, and such use leaves a detailed audit trail for future reference

(Phillips, 2007).

African economies are blighted by corruption (Asiedu & Freeman, 2009), which does not spare e-recruitment (Brunetti & Weder, 2003). In recruitment an organizational setting, with low internal controls and external controls are direct determinants of corruption and "an important aspect of internal control is whether the recruitment and promotion process in the bureaucracy is based on meritocracy or on nepotism." (Brunetti & Weder, 2003, p. 1803). Corruption in Africa can be perpetuated by the "power of moral norm" (what people view as normal), and the low risk of punishment for corrupt activities (Sassi & Ben Ali, 2017, p. 663). While information technology use can perpetuate corruption (Charoensukmongkol & Moqbel, 2014), it can also help in combating corruption by providing a mechanism to report administrative issues including corrupt activities (Sassi & Ben Ali, 2017).

Theme	Description	References
Cost	Discussion on cost benefits of e-recruitment	Kinder (2000); Lee (2007); Lee (2011); Parry & Tyson (2008); Parry & Wilson (2009); Pavon & Brown (2010); Thomas & Ray (2000)
Competitive Advantage	Discussion on competitive advantage of e-recruitment	Kinder (2000); Lee (2011); Parry & Tyson (2008); Parry & Wilson (2009); Pavon & Brown (2010); Reddy & Mamatha (2017); Thomas & Ray (2000)
Efficiency	Discussion on efficiency of e-recruitment	Kinder (2000); Lee,(2007); Lee (2011); Parry & Tyson (2008); Parry & Wilson (2009); Pavon & Brown (2010); Thomas & Ray (2000); Van Rooy et al. (2003)
Effectiveness	Discussion on efficiency of e-recruitment	Kinder (2000); Lee (2007); Lee (2011); Parry & Tyson (2008); Parry & Wilson (2009); Pavon & Brown (2010); Van Rooy et al. (2003)
Freedom (Unboundedness)	Discussion on freedom benefits of e-recruitment	Parry & Wilson (2009);
Feel (Pleasantness)	Discussion on beneficial feelings resulting from use of e-recruitment	Kinder (2000); Lee (2007); Parry & Tyson (2008); Pavon & Brown (2010)

Table 6: Benefits of E-recruitment

E-recruitment is not a recruitment panacea, as it comes with a number of challenges to the recruitment process (Thomas & Ray, 2000). These challenges occur very often despite ways and means devised to mitigate or eradicate them.

Challenge	Description	Reference(s)
Privacy and Security	Concerns on privacy and security in e-recruitment	Hogler et al. (1998); Smith & Rupp (2004); Vidros et al. (2016)
Lack of Information Technology Skills	Skills to use or develop e-recruitment information technologies are not always available	Fountain (2005); Smith & Rupp (2004)
Quality of Information Technologies	Concerns and doubts on whether information technologies can handle all recruitment tasks	Smith & Rupp (2004)
Concerns on Fairness of e-recruitment	Concerns on possibility of unfair treatment of some stakeholders in e-recruitment	Hogler et al. (1998); Smith & Rupp (2004)

Table 7: Challenges in E-recruitment

Among e-recruitment challenges is its unavailability in some geographic places (Pfieffelmann et al., 2010). Seminerio (2001) notes that jobseekers and recruiters who are information technology literate are the only ones who can make direct use of e-recruitment. If the relevant labour market is local, e-recruitment may be an overkill if it lacks geographical targeting, and information is made available to geographic locales where it is not useful (Thomas & Ray, 2000, p. 45).

Information technologies used in e-recruitment cannot stop information overload (Lang, Laumer, Maier, & Eckhardt, 2011) or unsuitable candidates or unsuitable recruiters from congesting the e-recruitment process (Cappelli, 2001; Faliagka et al., 2014; Lee, 2011; Pfieffelmann et al., 2010; Thomas & Ray, 2000). As speed is of essence to the recruitment process, a large pool of applicants means time will be wasted filtering for suitable applicants and filtering for relevant information.

Brazelton & Gorry (2003); and Sylva & Mol (2009) note that e-recruitment may come with perceived violations of ethics, rights or cultures, because of e-recruitment's insensitivity to human feelings. Due to the varied cultures involved in e-recruitment it is not surprising that some of the information requested on online job application forms potentially leads to discrimination, unfairness, intrusiveness and violation of applicants' privacy (García-Izquierdo et al., 2010, pp. 432–433). Discrimination accusations may be levelled against recruiters by jobseekers with no access to social networking sites should such sites be used to advertise job vacancies and to search for jobseeker details for purposes of recruitment (Boşcai, 2015; Brown & Vaughn, 2011; Clark & Roberts, 2010; Davison, Maraist, & Bing, 2011). On the other

hand, recruiters argue that by seeking more information about candidates on social networking sites they are trying to reduce the risk of recruiting an unsuitable candidate based on false information provided in formal job application documents (Kinder, 2000; Melanthiou et al., 2015; Vicknair et al., 2010; Williamson et al., 2010). Legal issues also arise when recruitment participants feel or observe that software involved in the e-recruitment process discriminates against them (Glick, Zion, & Nelson, 1988; Hogler et al., 1998). Clark & Roberts (2010) and Davison et al. (2011) note that ethical issues can surface, for instance when recruiters use a candidate's information on social networking sites (commonly considered private) to aid their decision on whether to recruit the candidate or not. "As the process of finding and screening applicants becomes ever more automated, the danger of inadvertently using inappropriate criteria grows" (Cappelli, 2001, p. 144).

Faliagka et al. (2012) notes that e-recruitment is further complicated by the variety of e-recruitment tools available and being developed, because the abundance of tools consumes the stakeholders' time as they choose the right tool. Information technologies on which the tools are built are changing rapidly and there are rapid shifts in recruitment practice (Sylva & Mol, 2009). The emergence of new recruitment settings e.g. e-recruitment, which continuously evolves makes it essential to continuously research on recruitment.

2.8 Characteristics of E-Recruitment Literature

This section discusses three characteristics of the e-recruitment literature pertinent to this tudy. These are (1) the status of published literature reviews on e-recruitment, (2) models and frameworks on e-recruitment and (3) studies focussing on multiple stakeholders.

2.8.1 Published Literature Reviews

I found four literature review articles on recruitment as detailed in Table 8.

Literature Review ID	Title/Focus of Literature Review	Description of Literature Review	Article Details
L1	Reflecting on E-Recruiting Research Using Grounded Theory.	45 articles were selected for this review. Perspectives taken in the articles were identified. Articles that presented perspectives of the jobseekers, recruiters, organization and other were 19,1,12 and 10 respectively. The other articles had perspectives of at least 2 stakeholders.	Wolfswinkel et al., (2010)
L2	Current Trends in Employee Recruitment Using the Internet	7 major services for applicants were identified, namely: general job board service, advanced job board service, advanced job search services, social and business network services, mobile services, advanced content and web 2.0 services, notification services and lead user services.	Furtmueller, (2013)
L3	Drivers, Challenges and Consequences of E-recruiting: A Literature Review	A sample of 23 articles was used to identify 14 drivers, 15 challenges and 9 consequences of implementing and using e-recruitment.	Lang et al., (2011)
L4	On the Untapped Value of e-HRM: A Literature Review	Research papers published from January 1990 to September 2013 were considered. 250 articles were selected from 76 journals. Review focuses on impact of Human Resource Management (HRM) on IT. 7 functional categories were identified, namely general, planning, staffing, recruiting, development, motivation and administration.	Wirtky et al. (2016)

Table 8: Literature Review Articles in E-recruitment

Sources L1, L2, and L3 were from Proceedings of the 18th European Conference on Information Systems; Proceedings of 4th International Conference, ICSOB 2013, Potsdam, Germany, June 11-14, 2013; and Proceedings of the 49th SIGMIS Annual Conference on Computer Personnel Research respectively. It is noticeable in the findings that literature review articles on e-recruitment are mostly in conference papers and are sparse [I note that Wolfswinkel, (2009) is an earlier version of Wolfswinkel et al., (2010), hence it was excluded from this selection]. L4 was sourced from the Communications of the Association for

Information Systems journal. [1]The contents of this thesis chapter may serve as the basis for an additional published literature review on e-recruitment.

2.8.2 Models and Frameworks on E-Recruitment

I identified an article by Lee, (2011) for proposing a E-recruitment model, and two articles by Llorens (2011), and Wang & Guo, (2012) for proposing frameworks for E-recruitment. Lee's (2011) e-recruitment integration decision model recognises that even though e-recruiting is widely implemented by organizations, its benefits are not always realized without the integration of interdependent processes, because inefficient bottleneck activities have a tendency to delay the entire recruiting process. Although e-recruiting technologies make it relatively easy to improve the recruiting setup process, it is complicated to coordinate the entire recruiting process. Thus the need for a e-recruitment integration decision model as detailed by Lee (2011) and Lee (2005).

Llorens (2011) proposed a typological framework of e-recruitment adoption and its impact. The framework points out that as the technical competency of jobseekers increases and organizational status gets high then adoption of e-recruitment becomes robust and the quality of the applicant pool improves. Details of the framework are presented by Llorens, (2011, pp. 413–415).

Wang & Guo, (2012) proposed a framework that uses recruitment information to assist in making decisions and to identify fraud in appraisal of enterprise performance. It needs to be noted that this framework uses e-recruitment information in decision making and emphasises that e-recruitment information can be used for evaluating a company's performance and to identify fraudulent companies.

While these articles present a model and frameworks related to, or involving e-recruitment, there are many aspects to e-recruitment and many areas of it needing understanding, hence a need for theory development studies in e-recruitment.

[1] Subsequently published as:
Abia M. & Brown I. (2020) Conceptualizations of E-recruitment: A Literature Review and Analysis. In: Hattingh M., Matthee M., Smuts H., Pappas I., Dwivedi Y., Mäntymäki M. (eds) Responsible Design, Implementation and Use of Information and Communication Technology. I3E 2020. Lecture Notes in Computer Science, vol 12067. Springer, Cham

2.8.3 Studies Focussing on Multiple Stakeholders

Many studies in e-recruitment focus on one stakeholder e.g. jobseeker, organization, government, etc. The majority of the studies focus on organizations. Table 9 gives the stakeholder focused on and studies associated with the focus.

Article Focus	Number of Articles	Articles	Comments
Jobseeker	14	Braddy et al., (2003); Braddy et al., (2009); Chiwara et al., (2017); Ehrhart et al., (2012); Faliagka et al., (2012); Feldman & Klaas, (2002); Hogler et., (1998); Jansen et al., (2005); Kashi & Zheng, (2013); Pavon & Brown, (2010); Smith & Rupp, (2004); Sylva & Mol, (2009); Walker et al., (2011); Yoon Kin Tong, (2009)	Jobseekers were the main focus in these studies
Organization	3	García-Izquierdo et al., (2010); Van Hoye & Lievens, (2007); Wang & Guo, (2012)	These studies focussed on corporate organizations.
Public Sector	2	Llorens, (2011); Selden & Orenstein, (2011)	Public sector mainly referred to government entities.
Multiple • Jobseeker, organization, e-recruitment providers	1	Parry & Tyson, (2008) • Parry & Tyson, (2008)	Jobseekers and corporate organizations were the focus of this study.
Other (Single Entity)	5	Bartram, (2000); Lee, (2007); Lee, (2011); Smyth et al., (2002); Vidros et al., (2016)	Bartram, (2000) discussed security, confidentiality and other issues in e-recruitment. Lee, (2007) focussed on an architecture for a holistic e-recruitment system. .An e-recruiting integration decision model was the outcome of Lee, (2011). Vidros et al., (2016) investigated security issues in e-recruitment.

Table 9: Focus of Articles in the Sample

Table 9 shows that only Parry & Tyson's (2008) study focused on multiple stakeholders by focusing on jobseekers, organizations and e-recruitment providers. This study provided insight into the success of e-recruitment in the UK. In e-recruitment, multiple stakeholders are involved and the expectation is that more studies would involve multiple stakeholders. This thesis attempts an investigation of multiple stakeholders (job-seekers and e-recruitment providers).

2.9 Summary of the Chapter

This chapter aimed at contextualizing the study and started with an introduction to the chapter, that was followed by: Purpose of the Literature Review in Classic-GTM, Identifying and Conceptualisation of E-

recruitment, Role of the IT Artefact in E-recruitment, Emerging Literature and Evolving E-recruitment, E-recruitment Adoption by Jobseekers and Recruitment Agencies, Benefits and Challenges in E-recruitment, Characteristics of E-Recruitment Literature relevan to this study, and a Summary of the Chapter. Having contextualized the study in this chapter, the next chapter details the research methodology.

CHAPTER 3: RESEARCH METHODOLOGY

3.1 Introduction

This chapter aims at describing and explaining the philosophy, methods and procedures used in the study and starts with an introduction to the chapter, that is followed by explaining the interpretive philosophical position adopted in the study. After arguing for the adoption of the interpretive philosophical position, reasons for adopting classic-GTM are presented and then methods for data collection and analysis are presented. Following these the chapter presents artefacts of classic-GTM approach. Potential controversies with classic-GTM are discussed, followed by details of data collection on jobseekers and recruitment agencies. Subsequent sections discuss Data Analysis, Ascertaining Quality of the GTM Process, Ehics and Summary of the Chapter.

3.2 Interpretive Philosophical Position

The two philosophical paradigms used often in IS research are positivism and interpretivism (Gregor, 2006). The choice between positivism and interpretivism is important for IS researchers as choosing either defines underlying assumptions in a study (Walsham, 1995, p. 376).

3.2.1 Rationale for Adopting Interpretive Philosophical Position

The reasons for choosing an interpretive philosophical paradigm for this study are that assumptions made in this study coincide with those espoused in the interpretive philosophy as shown in Table 10. GTM does not have any inherent paradigm, hence can accommodate all known philosophical paradigms (Glaser, 1978). Table 10 shows the match between assumptions in this research, assumptions in the interpretive philosophical paradigm and tenets of GTM.

Assumptions in this Research	Principles/Assumptions Espoused in the Interpretive Philosophical Paradigm	Assertion(s) in GTM
A grounded theory for e-recruitment exists in e-recruitment.	Principle of contextualisation, principle of abstraction and generalisation (Klein & Myers, 1999). Interpretivists dismiss the notion that all social phenomena are comprehensively describable and comprehensible "by referring to an observer-independent reality" (Klein & Myers, 1999, p. 2).	There is a grounded theory for every phenomenon.
The researcher does not have prior conceptions about perspectives of jobseekers and recruitment agencies on e-recruitment.	Principle of contextualisation, principle of abstraction and generalisation (Klein & Myers, 1999). Interpretive research in IS assumes that people in a substantive area are the creators of meaning in their interaction with the world around them (Krepapa & Berthon, 2003; Orlikowski & Baroudi, 1991; Walsham, 1995).	No researcher preconceptions (Glaser, 2013)
Jobseekers' and recruitment agencies' thoughts and actions in relation to e-recruitment are understood from their collective perspectives.	Principle of the hermeneutic circle, principle of contextualisation, principle of abstraction and generalisation (Klein & Myers, 1999). An interpretive approach assumes relativistic and shared view of phenomena where a non-deterministic perspective is evident (Orlikowski & Baroudi, 1991). Therefore, scientific knowledge is obtained by understanding human and social interactions that give meaning to components of the phenomenon (Klein & Myers, 1999; Walsham, 1995).	All is data and GTM enables the development of theory from interpretation of data (Glaser, 1978, 1998).

Table 10: Rationale for Selecting Interpretive Philosophical Paradigm

The assumptions captured in Table 10 show that there is corroboration between assumptions in this research, the interpretive philosophical paradigm and GTM. This corroboration provides rationale for adopting an interpretive philosophical paradigm in this research.

3.2.2 Approaches to Interpretation

Interpretation can be originalist (see Section 3.2.2.1) or non-originalist (see Section 3.2.2.2). This section examines both approaches to interpretation as presented in literature. This research adopted the originalist stance to interpretation, because the research relied on making meaning of the data to understand the phenomenon of e-recruitment.

3.2.2.1 Originalist Interpretation

In legal studies (law), originalism is a way to interpret where the interpreter considers meaning stable from the time of establishment (Colby & Smith, 2009; Nelson, 2003; Siegel, 2008). Although originalists focus on the interpretation of text of law, I explain originalism and its associated sources of meaning (i.e. intent theory and original theory) in the context of this study. Originalists adopt either original intent theory or original meaning theory; where original intent theory stipulates that interpretation should be consistent with the creators' semantic intention, while original meaning theory stipulates that originalists base meaning on what reasonable persons living at the time of creation of the object of interpretation would understand the subject of interpretation.

Critics point out difficulties in knowing the intents of the creators of the interpreted text (Barnett, 2006) or in this case, the enactors of the behaviours studied. In this study, the temporal proximity of the creators of the texts I interpreted and behaviours I observed allowed me to seek clarity on intents from the creators of the text and acts of the behaviours, however I still question if clarification given later (no matter how soon 'later' is) would reflect intents at the time of creation. In the face of a number of indeterminacies (Nelson, 2003), originalism is not the answer on its own.

3.2.2.2 Non-Originalist Interpretation

Non-originalism is an interpretive stance where interpretation goes beyond "what any group of persons thought or intended" (Brown, 2003, p. 69). "…most non-originalists treat the original meaning as the starting point for any interpretive inquiry, but are willing to look elsewhere—to history, precedent, structure, and policy, among others" (Smith, 2011, p. 707). This leads to the conclusion that both originalism and non-originalism have concern for how people assign meaning to behaviours.

3.3 Grounded Theory Methodology

This study aim was to inductively develop a substantive theory from empirical data on jobseekers and recruitment agencies, therefore GTM was selected as a suitable research methodology (Glaser, 1978, 1998; Glaser & Strauss, 1967). GTM is one of many inductive approaches (Glaser & Strauss, 1967, p. 225; Smith, 2015) induction being an approach that allows reasoning from detailed facts to general principles (Bussey, 1917; Feigl, 1934; Popper, 2005). GTM can result in the development of new theory and understanding in areas where such theories and understanding are needed (Hood, 2007, p. 155), which is the case in Namibia's e-recruitment environment. Approximately 23.2% of the Namibian population owns or has access to an Internet connection (Remmert, 2019) and usage of the Internet in e-recruitment needs understanding given its uniqueness.

GTM is by nature flexible in relating to philosophical paradigms (Glaser, 1978) including the interpretive philosophical paradigm adopted in this study. In addition to flexibility, this study needs to have freedom to be creative, original and autonomous and GTM allows researchers to coin their own concepts as dictated by the substantive area of study. This freedom allows for lasting contributions in a field of study and such contributions may be in the form of theory in response to Bondarouk et al.'s, (2017) call for theorising on the various e-HRM aspects.

Principles and procedures guide the GTM researcher to understand the researched phenomenon, and researchers perform GTM procedures in support of the principles of GTM (Glaser, 1998). Vital principles and procedures of GTM are the principle of emergence, principle of theoretical sampling, principle of constant comparison, coding, memoing and theoretical saturation (Glaser, 1978, 1992, 1998; Glaser & Strauss, 1967; Matavire & Brown, 2013). These intertwining and iterative principles and procedures are explained in detail in the following sections as they are applied in this GTM study. The extent and manner of application of the principles and procedures in a study's GTM approach depends on the GTM approach

used (Matavire & Brown, 2013). This study adopts the classic-GTM approach and I discuss how its principles and procedures are used in this study.

3.3.1 Classic-Grounded Theory Methodology (Classic-GTM)

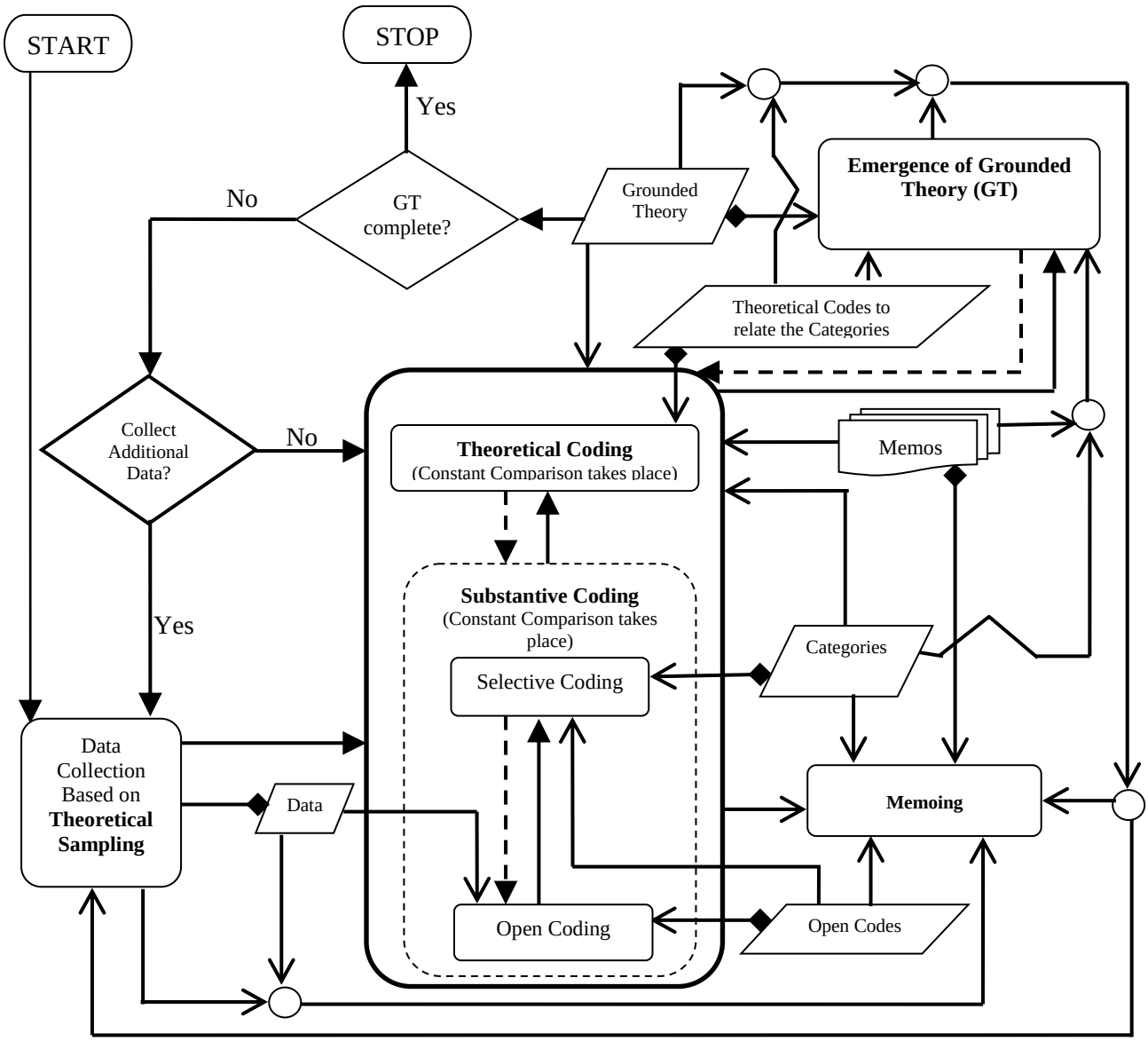
Matavire & Brown, (2013) identified four approaches to GTM use in Information Systems literature, namely, classic-GTM, evolved-GTM, the analytical approach to using GTM and the mixed method approach. The characteristics of each of the approaches are summarised in Table 11. Constructivist-GTM (Charmaz, 2006, 2009) could be considered as either an additional approach, or as an extension of evolved-GTM. Classic-GTM was introduced by Glaser & Strauss, (1967) and subsequently expounded by Glaser (1978, 1992, 1998) and others.

Approach	GTM principles	Coding	A priori theory	Paradigm model	Typical references
Classic	Required	Open, Selective, Theoretical	Should not be used	Viewed as one of a family of 18 theoretical codes	Glaser, (1992); Glaser & Strauss, (1967); and other works authored by Glaser
Evolved	Required (Glaser disputes adherence)	Open, Axial, Selective, coding for process	May be used as a sensitising device	Recommended	Strauss and Corbin, (1998). There could be references to Glaser's works
Analytical	Not necessarily	Any or all used	Often used	Sometimes used	Variety, but often Strauss's
Mixed method	Not necessarily	Any or all used	May be used	Sometimes used	Baskerville and Pries-Heje, (1999); Eisenhardt, (1989); Mingers, (2001) or any work claiming the creation of a Grounded Theory derived methodology.

Table 11: Approaches to GTM (Matavire and Brown, 2013 p. 124)

Classic-GTM and evolved-GTM (Strauss & Corbin, 1998) are the main GTM approaches and while classic-GTM is mainly conceptual, evolved-GTM is descriptive (Birks, Fernandez, Levina, & Nasirin, 2013; Duchscher & Morgan, 2004; Seidel & Urquhart, 2013). Classic-GTM is identifiable by its use of three coding procedures, namely open coding, selective coding and theoretical coding, while evolved-

GTM is identifiable by its acceptance of a quartet of coding procedures (open coding, axial coding, selective coding and coding for process) (Matavire & Brown, 2013; Strauss & Corbin, 1998). This study goes beyond description and explains behaviour of jobseekers and recruitment agencies in resolving the main concern in e-recruitment, therefore classic-GTM is suitable. Figure 2 shows the process followed in applying classic-GTM. The symbols used in Figure 2 are explained in the *Key to classic-GTM Research Process Depiction Diagram* section of the diagram, and the same symbols will appear in other diagrams in the document. All sympols in the diagram have retain the standard meanings they are known to have in a flowchart.


START
STOP
Yes
No
GT complete?
Grounded Theory
Emergence of Grounded Theory (GT)
Theoretical Codes to relate the Categories
Collect Additional Data?
No
Yes
Theoretical Coding
(Constant Comparison takes place)
Memos
Substantive Coding
(Constant Comparison takes place)
Selective Coding
Categories
Data Collection Based on Theoretical Sampling
Data
Memoing
Open Coding
Open Codes

Key to Classic-GTM Research Process Depiction Diagram

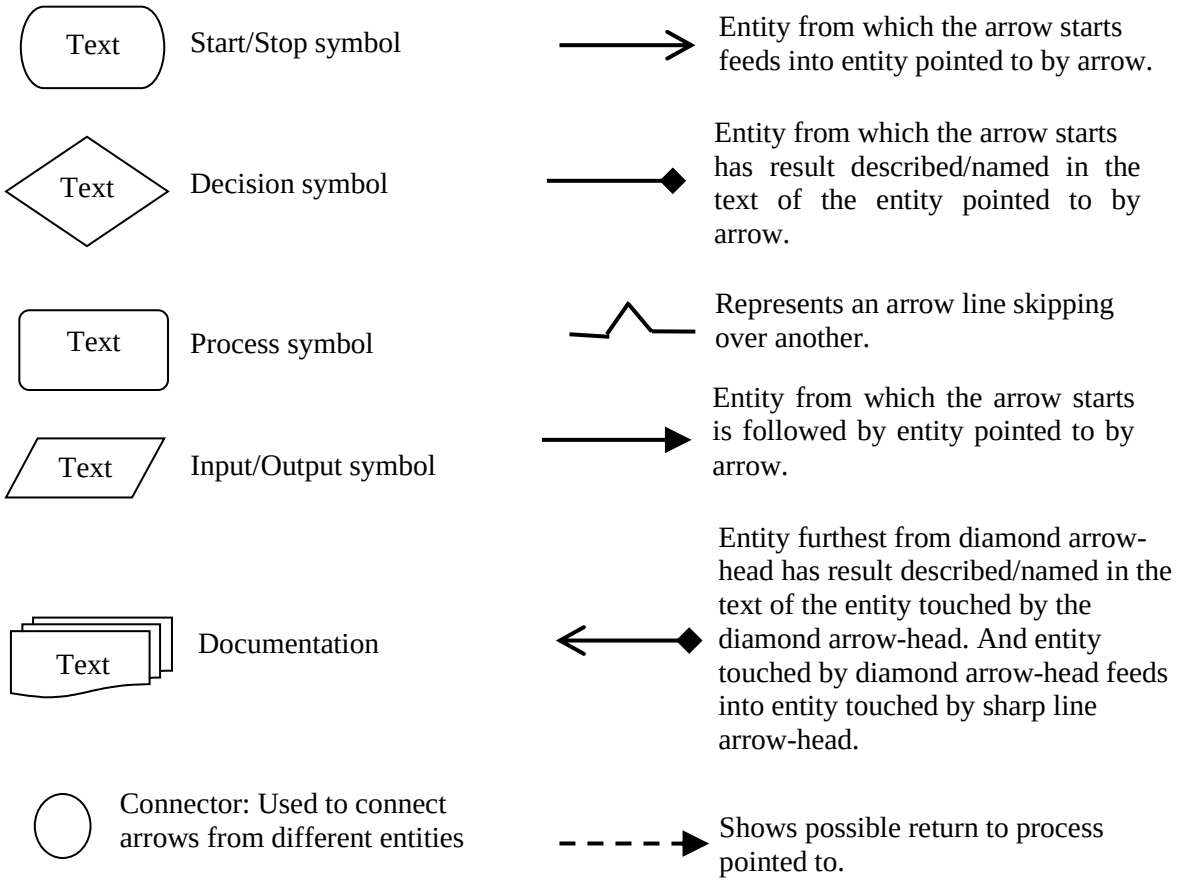


Figure 2: The classic-GTM Research Process

The other two GTM approaches are the analytical approach and the mixed method approach. The analytical approach is identifiable by the use of GTM procedures at the analysis stage of a study with little or no GTM principles evident prior to the data analysis phase and no theory development goal, while the mixed method approach combines elements of GTM with elements of other methodologies (Matavire & Brown, 2013). Weighed against the two, classic-GTM is a viable choice for this study because of its strong emphasis on emergence, theory development and concept-centricity.

Charmaz, (2006, 2008, 2009) defined an approach to GTM called constructivist-GTM. It is based on the following assumptions: (1) reality is multiple, arises from interactive process, and is constructed under

specific conditions; (2) the research process is a result of inter-action; (3) it takes into account the position of the researcher(s) as well as that of the research participant(s); (4) there is co-construction of data by the researcher and the researched, thus data are a product of the research process, not simply observed objects of it (Charmaz, 2008, p. 402). In this study it is assumed that researchers have no part in creating data, but collect data on the jobseekers and recruitment agencies for conceptual abstraction and generalisation (Klein & Myers, 1999), hence classic-GTM is more suitable for this study than constructivist-GTM.

3.4 Artefacts of Classic-GTM

When classic-GTM is used, there are a number of artefacts, including data, open codes, categories, selective codes, memos and the grounded theory itself, as shown in Figure 2. Processes resulting in the artefacts (also shown in Figure 2) are discussed in subsequent sections.

3.4.1 Data, Codes, Categories, Memos and the Grounded Theory

Data: Data is the raw material coming from the process of data collection. There are five types of data described by Glaser (1998, p. 138, 2011, p. 67) namely baseline data, interpreted data, properline data, vague data and conceptual data. Baseline data is descriptive and participants give baseline data when they describe their area and action. Interpreted data is descriptive of what is going on in a way that deliberates on shaping the view of a participant's area and actions. Properline data is collected, and provides an understanding of what participants view as proper about the phenomenon being studied. Vague data is data presented in an imprecise, fragmented, incomplete or obscure form. Conceptual data comes, as expected of it, with jargon prevalent in the phenomenon being studied (Glaser, 1998). These different types of data were not deliberately targeted, but awareness of the different types directed the way collected was analysed.

One perspective on classic-GTM data that other research methodologies view as unconventional is the "all is data" mantra. "In short, GT recognizes only an abstract conceptualization of whatever data pattern is generated by a researcher. Most GTM today uses interviews with observations. This type of data is the

focus of affirmations of interpretation and, constructivism, subjective and objective thoughts by QDA (Qualitative Data Analysis) researchers critiquing GTM. However, it is all data to the GTM researcher to constantly compare in the search for patterns about what is going on" (Glaser, 2011, p. 67). Although every effort is made to obtain valid and in many cases objective data by GTM researchers, "there is in GTM no claim of objectivity, no claim of accurate description, there is just a claim of abstractions based on whatever data there is" (Glaser, 2011, p. 67). The rationale for not claiming for the objectivity of the data can be extended further by noting that interviews and other means of data acquisition are not perfect to the point of always producing indisputable data. Thus GTM researchers view all abstractable material as data, and the process of abstraction results in codes and other artefacts from analysis of data.

Open Codes: These are the nascent artefacts of the process of abstraction of the data. Open codes are a result of open coding or in a different phrase "running the data open" (Glaser, 1978, p. 56). In general, "the code gives the researcher a condensed, abstract view with scope of the data that includes seemingly disparate phenomenon" (Glaser, 1978, p. 55). Constant comparison enables the coding process as emerging concepts are compared to other emerging concepts, and existing concepts. Codes can be substantive or theoretical.

***Substantive Codes and Theoretical Codes*:** Substantive codes and theoretical codes are two types of codes exposed by the practice of classic-GTM. While substantive codes capture the empirical substance of the area of study, theoretical codes conceptualise the relationships that may hold between substantive codes in the formation of a theory (Glaser, 1978, p. 55). Classic-GTM researchers understand theoretical codes as implicitly conceptualising how substantive codes will relate to each other in the formation of a theory to account for the resolution of the main concern (Glaser, 1998, p. 163).

Categories: A category is a set of codes sharing similar attributes. "A category captures the underlying patterns in the data" (Glaser, 1998, p. 135). Glaser (1998) further notes that every category has properties that are concepts about the category. Categories have conceptual levels, with the highest being the core

category (see section 3.4.2) followed by sub-core categories and then categories for theoretical completeness. Section 3.4.2 explains the core category and gives criteria for identifying it and other categories at other conceptual levels. At some point open coding which produces codes and their categories comes to an end and selective coding begins.

Selective Codes: Selective codes are chosen from the large set of categories generated during open coding. After identifying a potential core category from the ones that emerged from open coding, selective codes are related to the core category (Glaser, 1978, p. 61). The logic of having selective codes is to delimit data collection and theoretical sampling in such a way that the two processes serve the emerging theory. As categories develop around the core category, memos become more focussed on the selected categories and the developing theory (Glaser, 1978, 1998, 2014).

Memos: Glaser (1978, p. 83) states that "memos are the theorising write-up of ideas about codes and their relationships as they strike the analyst while coding." After years of classic-GTM practice and experience Glaser (2014, p. 143) added that memos can also happen while collecting and analysing data and during memoing. Memos help guide theoretical sampling, and aid in capturing and tracking the emerging theory. After their maturity and saturation memos are sorted and used to do the write-up (Glaser, 2014, p. 143). Memos provide the means for integration of all into a grounded theory.

Grounded Theory: is the ultimate outcome of a classic-GTM study that explains the phenomenon and represents how participants in a study resolve their main problem (main concern). Chapter 6 in this study gives details on the grounded theory that emerged in this study. The theory from classic-GTM is a substantive theory because it is located in a structural unit, however Glaser (1998, p. 137) asserts that through logic and experience, the theory goes beyond the temporal and space boundaries of this unit and covers in relevancy units similar to the one from which it is developed. The name of the theory is usually borne of the core category, however this is not a rule but a norm in classic-GTM studies.

3.4.2 Main Concern and Core Category: Classic-GTM Meeting Research Objectives

The rational for adopting classic-GTM for this study is that it fulfils the objectives of the study mentioned in Chapter 1, which are: 1) to identify the main concern of jobseekers and recruitment agencies in e-recruitment in Namibia and 2) to understand how the concern is processed and resolved by jobseekers and recruitment agencies. After making this claim for classic-GTM for the study it is necessary to detail how it fulfils the objectives.

While the idea of the main concern mentioned in the first objective is self-explanatory, there is value in detailing it from the perspective of classic-GTM. The main concern is the problem faced by people in the phenomenon the researcher is studying (Glaser, 1978). The question leading to the researcher wanting to find the main concern is, "What is the basic social psychological problem faced by participants in the action scene?" (Glaser, 1978, p. 57). Glaser (2015) also refers to the main concern as the core problem (p. 9). The researcher discovers the main concern through what the data provides in response to the general questions; "What is happening here?" (Glaser, 1998) and "What is this data a study of?" (Glaser, 1978, p. 57). The more direct question is "What is the participant's main concern?" (Glaser, 1998, p. 140). The participants' ways of trying to resolve the main concern bring out the core category (Glaser, 2014, pp. 73–74).

The core category (core variable) captures the continual resolution of the main concern (Glaser, 1998, p. 115). A core category "can be any kind of theoretical code: a process, a typology, a continuum, a range, dimensions, conditions, consequences, and so forth." (Holton, 2010 p. 29). The core category is a category that reflects what is going on in the substantive area in resolving the main concern (Glaser, 1978). In addition to functions common to all categories, the core category relates to all other categories relevant to the developing theory in the phenomenon (Glaser, 1998, 1978). It focuses on explaining how the main concern is processed or resolved hence it becomes the centre of further selective data collection and coding (Holton, 2010).

In determining the core category potential core categories must be noted and labelled as soon as they emerge so that the analyst can associate them with emerging codes (Glaser, 1978). A research study needs a means to separate the core category from other categories. Glaser (1978, p. 95-96) provides such means in the form of a checklist of the imperative characteristics of a core category: The characteristics are: centrality, recurrence, saturation time, relations with other categories, implications for formal theory, carry through, variability, recursion, prevention, and deception, which are described in Table 12.

	Characteristic	Description
1	Centrality	The core category needs to relate to as many categories as possible in the study, ideally it must relate to all categories in the study. The core category must be the category that relates to more categories in the study than any other category. The centrality pre-requisite indicates that the core category must account for most of the variation in the behaviour of participants in the study.
2	Recurrence	The core category has to have the most frequent recurrence in the data. The core category frequently recurs in data, which is evidence of it being a stable pattern rampant in the data, and it will relate to other categories because it exists with them in the same piece of data.
3	Saturation Time	The core category takes the longest to saturate because it is the prevalent and dominant pattern in the data.
4	Relations with other categories	Meaningful and easy relations with other categories are indications that a category is a core category. The relations have to ease into being without forcing.
5	Implications for formal theory	The core category has to be logically inviting to the development of formal theory.
6	Carry through	The core category allows data analysis to continue because of its relevancy. The core category must have enough explanatory power to let the analyst complete the analysis without hitting dead-ends.
7	Variability	The core category is malleable. Condition can easily vary the core category without making it loose its core explanatory powers.
8	Recursion	The core category explains why it is a solution to the problem. The core category explains itself.
9	Prevention	The criteria presented thus far prevent the derivation of core category from sources other than the data being analysed e.g. deductive, logical elaboration.
10	Deception	The core category emerges when the analyst avoids preconceived logical reasoning which is alien to the data.

Table 12: Characteristics of a Core Category (Glaser, 1978, p. 95-96)

While classic-GTM leads to the main concern and the core variables, there are controversies surrounding some of its aspects.

3.5 Potential Controversies with Classic-GTM

Classic-GTM does not follow the norm generally accepted in other research methodologies and a number of its aspects are subjected scrutiny and/or criticism by researchers from other methodological disciplines.

Some aspects of classic-GTM that have attracted scrutiny and invited controversy are: nature of research question, essence of a literature review, logic of not tapping or verbatim recording of interviews, and nature of findings.

3.5.1 Nature of Research Question (The Problem) in Classic-GTM

Classic-GTM studies let the research question emerge as the study is done, thus at the beginning of the study there is no preconceived, narrowly-focused research question, but a more open, general question. The argument put forward by researchers in classic-GTM including Glaser (1998, p. 115) is that the preconceived problem which normally leads to research in other methodologies is "of interest to the profession or some professional, is often not there and if there, not of great concern to the participants in the substantive area." Further, "the professional problem is usually based on pet categories (e.g. self-image) and pet interests. It usually is irrelevant to the participants and the research produces few or no findings of relevance. Yet professional authority and pressure make the professional problem a must. This is especially so for the PhD candidate who needs to please." (Glaser, 1998, pp. 115–116). In order to counter this professional authority classic-GTM studies, including this one, present a question that seeks for the participants' problem or main concern. Hence the research questions: 1) What is the main concern and sub-concerns of jobseekers and recruitment agencies in e-recruitment in Namibia?, and 2) How are the concerns processed and resolved by jobseekers and recruitment agencies? Details about the importance of the main concern in classic-GTM studies have been discussed in Section 34.2 above.

The research question within classic-GTM studies serves the interest of participants and directs professionals (researchers) to address inclusive interests, i.e. interests that accommodate both the professional and the participant. Relevance of research comes from the people or elements being studied (Glaser, 1998, p. 116) in as much as professionals have a part to play, therefore participants must have a significant say in what the problem is.

3.5.2 Essence of the Literature Review in Classic-GTM

With reason, classic-GTM guides "do not do the literature review in the substantive area and related areas where the research is to be done and when the grounded theory is nearly completed during sorting and write up, then the literature search in the substantive area can be accomplished and woven into the theory as more data for constant comparison." The reason behind these dicta is to allow the researcher to be open to accepting emerging concepts and not to be unduly influenced by the literature. Although desirability bias is usually associated with participants' responses in research (Akbulut, Dönmez, & Dursun, 2017; Ecken, Gnatzy, & von der Gracht, 2011), it may also happen that researchers may wish to be seen in good light by authorities in the profession or research domain through adopting known, preferred or popular theories and concepts in their research. Thus, classic-GTM advises against doing the literature review before the study. However, even in classic-GTM the researcher has to contextualise, hence this study has a literature review (Chapter 2) to contextualise the phenomenon (Christensen, 2011).

3.5.3 Logic of Not Taping or Verbatim Recording of Interviews

Conventional qualitative research methodologies advocate for taping of interviews as a way of substantiating or verifying findings (Bucher, Fritz, & Quarantelli, 1956; Glaser, 1998; Glogowska, Young, & Lockyer, 2011). On the contrary a classic-GTM researcher always keeps in mind that, "when doing grounded theory there is no need for complete recording of the interview as one would want in descriptive completeness." (Glaser, 1998, p. 107). Glaser (1998) reasoned that the shortcomings of taping include no delimiting of the data, and extension of research timing. No delimiting of the data occurs because, "by forcing the collection of indicators over and over, that indicate the same category and its properties, since the real-time of taping cannot be stopped, the researcher is overwhelmed with unnecessary data for generating instead of delimiting it." (Glaser, 1998, p. 108). Also classic-GTM and Glaser (1978) explain that continued data collection by taping ignores theoretical saturation, a situation where no new indicators on the category are emerging from the data. Since there will be repetition of data

in taping interviews, the time for doing the research is extended unnecessarily because the researcher will code for the same category repeatedly.

3.5.4 Nature of Findings

The lack of direct quotes from data in the findings chapters (Chapter 4 and Chapter 5) of this thesis is explained by the fact that "grounded theory uses the incidents in field notes as illustrations of the meaning of categories and their interrelations. " (Glaser, 1998, p. 113). Field notes do not aim to capture direct quotes and hence the findings of this classic-GTM study do not have direct quotes.

3.6 Data Collection on Jobseekers Based on Principles of GTM

Data collection on jobseekers was guided by sound classic-GTM principles and procedures, and practice of sound ethical considerations. At the beginning of data collection, I was not aware of the number of respondents who were going to be part of the research, which is expected when theoretical sampling is applied. At the point of theoretical saturation (no new concepts emerging from more data collected) twenty seven (27) jobseekers had responded to the study. On 2 March 2015, the first interview took place in Windhoek and many more were to follow in the coming months. Secondary sources e.g. Internet and local newspapers provided additional data for the research. All necessary research ethics considerations in relation to participants were heeded after the university's ethics in research committee approved this research (See Appendix J).

Participants were asked for their consent to participate in this research, and gave consent verbally although some indicated consent via emails (see Appendix E). The thesis protects participants' privacy by using pseudonyms (see Appendix A) in place of real names. The use of pseudonyms was preferred for this research over the norm, where participants are identified using numbers (e.g. Participant 1, Participant 2, Participant 3, etc.). The use of pseudonyms made me feel that I was dealing with a phenomenon where people were involved, even during the process of writing the thesis. Further, participants' rights and freedoms were upheld by informing them that their participation was voluntary

and they had every right to communicate their preferences at any time or even withdraw from the research. The sample of participants was a result of the process of theoretical sampling.

3.6.1 Theoretical Sampling of Jobseekers

Sampling of jobseekers was based on three criteria in order to ensure relevancy of the jobseekers to the study. Firstly, the jobseeker had to be "picked" by the developing theory through its data requirements for further development and if the jobseeker was likely to provide the data then s/he was a candidate participant if other criteria were met as well. The first criterion is based on the definition of theoretical sampling by Glaser & Strauss, (1967, p. 45), which presents it as data collection with joint coding and analysis of data and making decisions on the data to collect next and where to find it in order to develop theory. Secondly, the jobseeker had to be currently using information technology in job seeking or making effort to use information technology in job seeking activities. Thirdly, the jobseeker had to consent to taking part in the research for ethics reasons. The plan, which was to engage the phenomenon of e-recruitment from the perspective of those living it and guard against the early influence of extant literature also makes sense based on Corley, (2015); Duchscher & Morgan, (2004), Locke, (2015) and Glaser & Strauss, (1967, p. 33).

The initial decision on data collection on jobseekers was based on finding jobseekers who met the last two of the three criteria given above because of the absence of a developing theory. Theoretical sampling was initialized in this way because I wanted to initialise the study based on concepts that were relevant to the area of study. This approach is in line with practice in classic-GTM (Glaser, 1978), where theoretical sampling is based on concepts relevant to the study. After jointly collecting data, coding it and analysing it, a theory started to develop and theoretical sampling proceeded.

When data was collected, constant comparative analysis was applied by comparing codes to codes and concepts to concepts to find and note their relationships and further develop the theory. The emerging theory served as a framework for further data collection and using systematic deduction from the

emerging theory theoretical possibilities and probabilities were determined, which serves as a guide to what data were supposed to be collected next. This approach coincided with Glaser's (1978, p. 40) guidance on how to determine the next set of data to collect using theoretical sampling.

By and by, theoretical sampling was performed until all the categories (groupings of related concepts) got saturated and the theory completed. Glaser (1998) defined saturation as a state of categories where new data does not bring new properties to the categories. In an effort to attain completeness a check was done to make sure all categories relevant for the theory to make sense were included and related to each other.

3.6.2 Unstructured Interviews and Open-ended Questions

I used unstructured interviews to elicit data from jobseekers because I wanted to give the jobseeker the freedom to express his/her pertinent concerns without being constrained by the nature of the interview. Although an interview can be unstructured, structured or semi-structured (Doody & Noonan, 2013; Macan, 2009; Myers & Newman, 2007; Schultze & Avital, 2011), the choice of unstructured interviews was motivated by the lack of a theoretical framework coming into the research. In a structured interview, a complete interview script is prepared beforehand and the interviewer needs no improvisation when the interview is underway (Myers & Newman, 2007, p. 4) and this would have required me to have a preconceived theoretical framework, and preconception was not suitable for this study. An unstructured interview for the purpose of GTM research does not require an interview script prepared beforehand and the researcher should not influence the scope or depth of the participant's responses (Duffy, Ferguson, & Watson, 2004, p. 69). After the theory had started developing I then used semi-structured interviews as well under the guidance of the emerging theory. In a semi-structured interview, the interviewer requires more focussed information and thus opens the discussion and uses prompts to guide the respondent (Duffy et al., 2004, p. 69). In many cases the interview process followed a 'depth-first' approach (see Figure 3) in that I prompted the jobseeker to elaborate on a specific relevant-to-study datum s/he exposed earlier in response to one or the other question. If some other relevant datum emerged from such follow up I would again prompt for further elaboration on it and so on (see Figure 3).

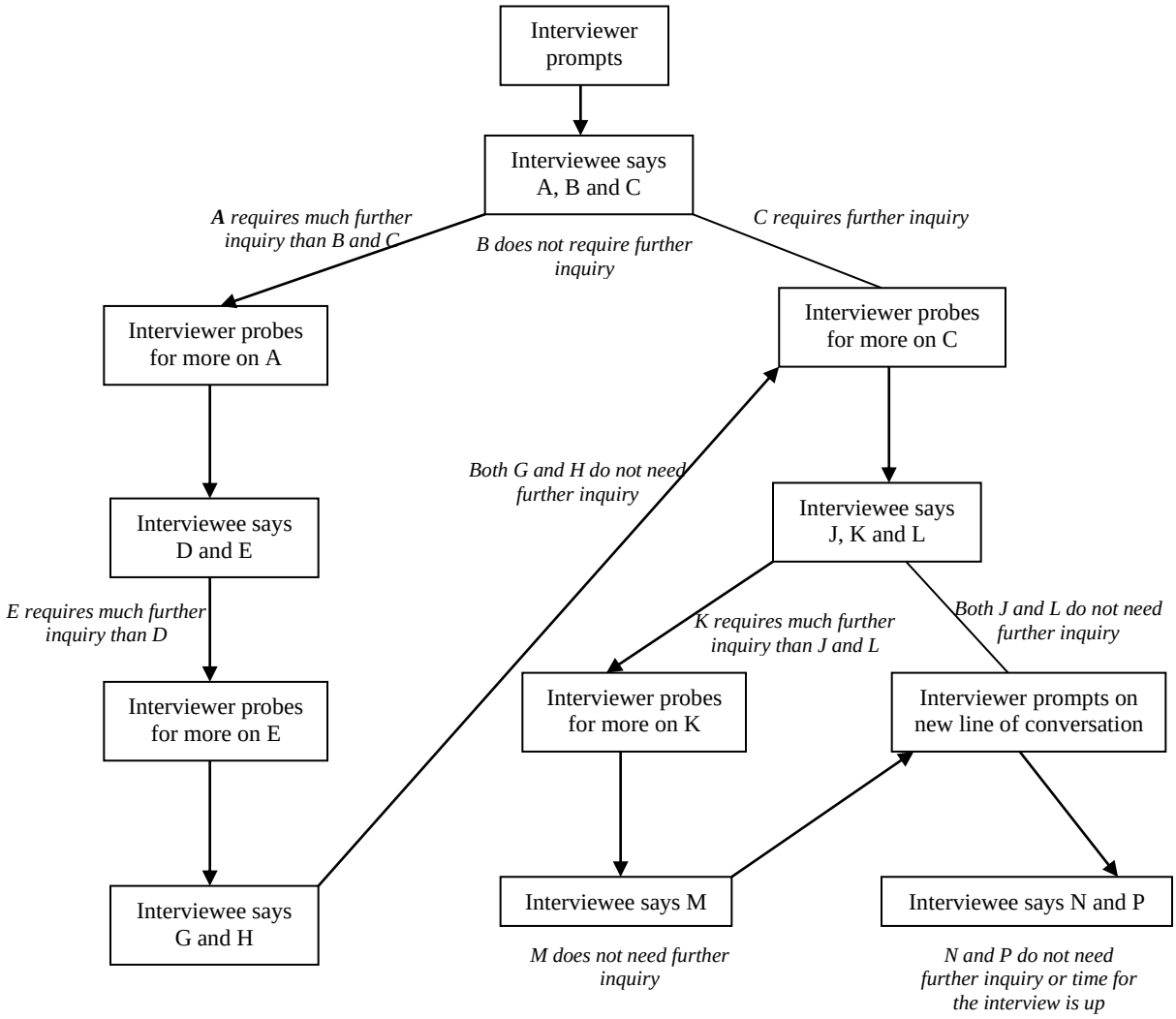


Figure 3: Interviewing Style: Depth-First Interview

The 'depth-first' style of interviewing allowed the most relevant data given by the jobseekers to have the strongest chance for follow-up questions. In the absence of relevant data in the interviewee's response, a new conversational strand was initiated.

The interviews were mostly telephonic, in line with jobseekers' preferences, and the approximate average duration for each interview was 25 minutes. It was noted that telephonic interviews provide data of comparable quality to face-to-face interviews, which was not a surprise as literature, e.g. Carr & Worth

(2001, p. 511) and Musselwhite et al. (2007) attest to that. Some of the interviews were face-to-face, which allowed me to obtain non-verbal cues from the participants.

Some participants were interviewed multiple times because the emerging theory guided me to selecting them as possible sources of relevant data on multiple times. In some cases there were multiple possible sources of data including new jobseekers, but I preferred wherever possible, jobseekers I had already spoken to before in order to avoid the overhead expense associated with initiating an interview. In addition some researchers e.g. Hydén, (2014) observed that repeated interviewing allows the respondent and the interviewer to develop a relationship of confidence and honesty. However, there are claims that repeated interviewing of the same participant might result in the participant providing biased data (Wax & Shapiro, 1956, p. 215), I was aware of that and I always considered the quality of data to be obtained from the repeat interviewee before engaging him/her as opposed to interviewing a new interviewee.

Open-ended questions were used often in the interviewing process, especially at the initial phases of theory development. Open-ended questions enabled me to avoid influencing jobseekers' responses because I did not suggest possible responses to them, which confirmed Reja et al.'s (2003, p. 159) assertion that open-ended questions give respondents the freedom to respond to questions without undue influence from the researcher.

I made field notes for all the interviews conducted, which enabled me to capture important data chunks from the interviews. Taping is not encouraged in classic GTM (Glaser, 1998; Holton, 2010), however I taped and transcribed some of the interviews to satisfy the perspective that tape recordings are a show of transparency and proof that the interviews took place. Many jobseekers did not want me to make a video or audio recording of the interviews, therefore field notes were sufficient for the research. I wrote field notes soon after all interviews (see Appendix B). Many researchers view field notes as written records of interactions that take place in the field being studied (Jackson, 1990) . Field notes described for this research as they did for Kawulich, (2005) and Montgomery & Bailey, (2007) social artefacts and social

interactions gathered during data collection. Qualitative review committees sometimes allege that field notes lack rigour, but in this study the argument, as with Holton, (2010, p. 25), is that by using field notes the essence of the participants' main concern and its resolution (core variable/category) are captured without going through the mammoth task of transcribing interviews. Field notes were useful for recording both verbal interactions and observations in this study.

3.6.3 Observation of Jobseekers

Observation provided useful data on jobseekers, but I acknowledge, as Creswell, (2009, p. 179) did, how difficult or impossible it can be to observe participants in a research. To me observation meant I noted things that happened and listened to what jobseekers said over a period of time, which is what is expected as in Becker & Geer, (1957); Li, (2008); Nandhakumar & Jones, (2002); and Schwartz and Schwartz, (1955, p. 343). I decided to have phases of passive observation and phases of participant observation. As a passive observer (Li, 2008; Nandhakumar & Jones, 2002) I distanced myself from being a part of e-recruitment during the observation process at one point, but at some other point in data collection I was a participant observer as defined by Li, (2008) and Nandhakumar & Jones, (2002). In being a participant observer I was not simulating job seeking - it was for real because my employment contract was ending at the end of the year 2015 and I had to look for employment before then. Because I had phases of both passive and participant observation, I benefited from the objectivity associated with passive observation and intimacy to the phenomenon that comes with participant observation as discussed by Tedlock, 1991, p. 71).

I carried out unstructured observations during the initial stages of data collection and later on did semi-structured observations as the developing theory guided the observations. After understanding unstructured observation, structured observation and semi-structured observation as explained in literature e.g. Mulhall (2003), my purpose for implementing unstructured observations was to understand and interpret behaviour of jobseekers without enforcing any ideological schedules Adopting structured observation would have required me to enforce predetermined ideological schedules based on taxonomies

developed from pre-existing theory, and semi-structured observation would have required me to mix the other two approaches. I devised a protocol for semi-structured observation of participants (See Appendix D).

3.6.4 Collection of Secondary Data on Jobseekers

I collected secondary data on jobseekers because in spite of it having been prepared for other purposes, it responded to the needs of the emerging theory. The purpose and nature of secondary data is explained by many authors (Huston & Naylor, 1996; Zimmer, 2010). I collected data from websites, online repositories, email communications and other sources as directed by the process of theoretical sampling. Appendix F shows a jobseeker profile noted on a professional website and is part of secondary data noted for the research. Some of the advantages of collecting secondary data were given by Huston and Naylor, (1996) as reduction of challenges faced when using interviews or observations. However, there are ethical tensions associated with using secondary data, especially in the age of the Internet where some would argue, "but the data is already public" (Zimmer, 2010). If the data is already in the public domain then the ethical issue of privacy becomes a matter for debate (Zimmer, 2010, p. 314).

3.7 Data Collection on Recruitment Agencies Based on Principles of GTM

I collected data on recruitment agencies in the same time interval as I collected data on jobseekers, however most data collected and analysed was from jobseekers. As mentioned in the previous section, theoretical sampling was initialised when I started collecting data on jobseekers and according to my approach there was no need to initialise theoretical sampling again, I used guidance from the emerging theory to collect data from both job seekers and recruitment agencies.

3.7.1 Theoretical Sampling of Recruitment Agencies

Since a theory started emerging from data on jobseekers I was guided by this emerging theory to simultaneously collect data from recruitment agencies and jobseekers. The criteria for selecting a recruitment agency were two. The agency had to be pointed to by the emerging theory as a possible and

probable source of data and the agency consented to provision of data for use in this research. I noted that use of data on many recruitment agencies was guided by terms and conditions, which in many cases allow their data to be used for non-commercial services and this research is not a commercial endeavour. However, I made effort to get explicit consent of interaction and data collection with the recruitment agencies. The process of theoretical sampling for eliciting data on recruitment agencies was similar to the process described for sampling data on jobseekers. I also applied techniques like interviewing, observation and secondary data sourcing similarly.

3.7.2 Unstructured Interviews and the Principle of Emergence

Interviews I conducted with recruitment agencies were unstructured in the same sense as the ones I did with jobseekers. Since jobseekers interacted with recruitment agencies, they also provided me with data on recruitment agencies from their perspectives. Interviews were conducted with representatives from two of three recruitment agencies.

3.7.3 Observation of Recruitment Agencies

Although I had a brief attempt at observing recruitment agencies (see Appendix D for the observation protocol), I realised that I could consult with jobseekers on their observation of recruitment agencies because during interaction with jobseekers it emerged that they observed recruitment agencies in as much as they had experiences interacting with them. By making use of the jobseekers I managed to get data from participant observers as defined by Li (2008); Nandhakumar & Jones (2002); and others. I decided to make use of jobseekers' observation of recruitment agencies because if I was to engage in a full observation of recruitment agencies' exercise every time the theoretical sampling approach demanded it, I was going to spend a lot of time seeking data that jobseekers had already acquired through past observations, therefore I got the data by interviewing jobseekers. This approach extended the scope of my data to several recruitment agencies, since jobseekers observed and had experiences with several recruitment agencies. Observation by jobseekers in this way was not formalised and thus it excluded many of the drawbacks of a formalised observation exercise, and the data from it covered a considerable

time span. On the other hand, I was aware of the argument posed by some e.g. Tedlock, (1991, p. 71) that only an outside observer can be objective. Thus aside from the cancelling effects that the biases from jobseekers had on each other, I also, as was the case through the whole research, tried to exercise due diligence in accordance with classic-GTM. I was able to use jobseekers' observations because classic-GTM does not give restrictions on the sources of data (Glaser, 1998), therefore it was within the confines of GTM methodology to obtain observation data on recruitment agencies from jobseekers.

3.7.4 Collection of Secondary Data on Recruitment Agencies

I collected secondary data relevant to meeting the objectives of the research from recruitment agencies' websites, social media and professional website presence as guided by the developing theory. My collection of the data from secondary sources was selective because by definition see Huston & Naylor, (1996) or Zimmer, (2010), secondary data is data collected by others, for purposes other than to respond to the research question at hand. The challenges faced in data collection using interviews and observations (Huston & Naylor, 1996), were reduced by having secondary sources of data.

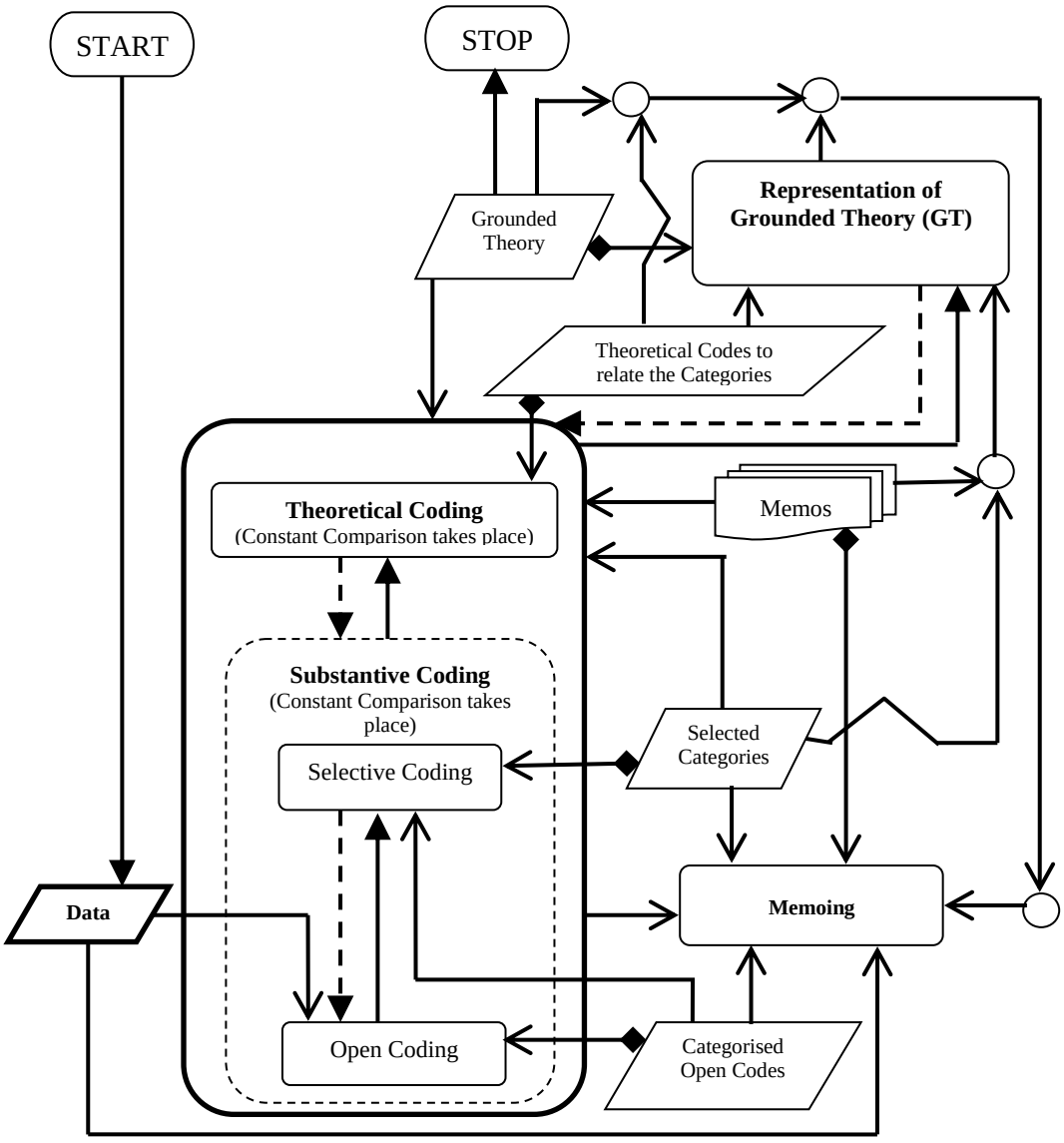
3.8 Data Analysis

Because of the need to obtain explanation on the e-recruitment phenomenon, the data collected on jobseekers and recruitment agencies were analysed according to the canons of classic-GTM (Glaser, 1978, 1992, 1998, 2007, 2011; Glaser & Holton, 2005) approach as explained earlier in this chapter. However I did not blindly follow these canons I followed reason in applying them. I give a detailed explanation of aspects of classic-GTM data analysis, consider requisites of the key activity of coding before dwelling on coding itself.

3.8.1 Classic-GTM Data Analysis

Data collected in this research was recorded in the form of textual field notes. Using the field notes, the data was analysed following three coding steps proposed and explained by in classic-GTM (Glaser, 1978, 1992): open coding, selective coding and theoretical coding. Open coding and selective coding are

collectively called substantive coding as shown in Figure 4 that depicts the overall analytical process based on the grounded theory method followed in this study. The analysis started with data and ended with a complete theory. But it has to be noted that this analysis process was iterative as shown in Figure 4. Standard flowchart symbols in the diagram retain the standard meanings they are known to have in flowcharts. Otherwise, the key provided with the diagram states the meanings of the symbols.



Key to Classic-GTM Research Process Depiction Diagram

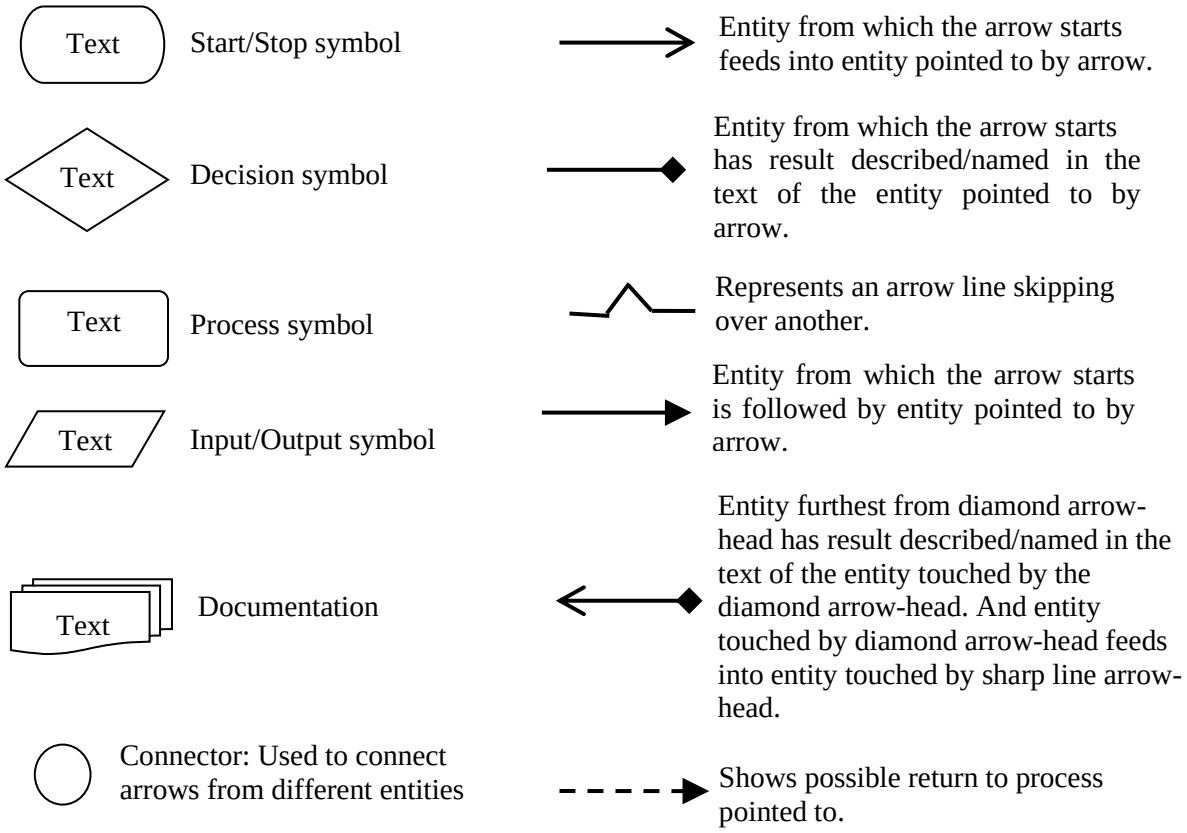


Figure 4: The Process of Data Analysis (Glaser, 1978, 1998)

In GTM data is firstly subjected to open coding, which is aimed at coding the data in "every way possible" (Glaser, 1978, p. 56), capturing every possible meaning of the data in open codes. The coding process follows a "bottom-up" approach (Urquhart, 2013, p. 38), where data is placed at the lowest level followed by codes and categories. The codes resulting from open coding are put into categories resulting in categorised open codes, based on their meaning before selective coding is done. Selective coding is done as a continuation of the coding process, and by the logic of GTM (Glaser, 1978), it means the categories from open coding are subjected to selection based on their fit with the emerging theory. Only categories that fit the emerging theory are considered when coding continues at the theoretical coding stage. Theoretical coding is the process of relating categories coming from selective coding, and it is informed by the memos, which already note relations between categories, and the emerging theory.

3.8.2 Requisites of the Coding Process

Data, constant comparison and theoretical sensitivity are recognised as requisites for the coding process from its onset, and once coding has started; data, constant comparison, codes, categories memos and theoretical sensitivity are essential requisites of the coding process. This is evidenced in GTM literature e.g. Glaser, (1978, 1992, 1998, 2014), Holton (2010). When these requisites were met, the result was a complete theory with saturated categories, thus in addition to the discussion on requisites of the coding process in this section I also discuss completeness of the theory and theoretical saturation of the categories.

I viewed data as facts obtained on e-recruitment during data collection and ended with completeness and theoretical saturation of all categories. Constant comparison was carried out throughout the coding process, because coding of data needs it (Glaser, 2004). Comparisons were made between incidents aimed at establishing the underlying uniformity and variety of conditions of generated concepts and hypothesis, also, emerging concepts were compared to more incidents in the data to generate concepts' new theoretical properties and relevant hypotheses as was essential and sensible. Constant comparison also involved the comparison of emergent concepts to each other so as to establish the best fit between potential concepts and a set of indicators in data. Collected data's support of emerging categories was checked through constant comparison. Further, constant comparison helped in consolidation of emerging categories by defining their dimensions and properties. Constant comparison was carried out throughout the coding process with as expected (Glaser, 2004) comparisons between incidents aimed at establishing the underlying uniformity and variety of conditions of generated concepts and hypothesis. Also, emerging concepts are compared to more incidents in the data to generate concepts' new theoretical properties and relevant hypotheses (Glaser, 2004). Constant comparison also involved the comparison of emergent concepts to each other so as to establish the best fit between potential concepts and a set of indicators. I aimed the process of constant comparison at theoretical elaboration, saturation and verification of concepts, and development of concepts' properties so as to achieve densification of the concepts and also

generation of further concepts. GTM notes the use of constant comparison in consolidation of emerging categories by defining their dimensions and properties, I used it for such consolidation as well. Constant comparison was made easier by other processes like memoing, which involved the writeup of ideas based on the ongoing GTM process.

The view of memoing, which is also echoed in GTM literature (Glaser, 1992, 2011) was that, it is the theoretical write up of ideas related to codes and the codes' relationships to other codes or alternatively and equivalently, "the theorizing write up of ideas as they emerge" (Glaser, 1992, p. 108). The memos can aptly be described by Lempert, (2007) who viewed memos as reflective of formulation of ideas related to the data and exploration of the ideas. I used theoretical memos as expected in GTM (Glaser, 2012, p. 31), to conceptualize the main concern and how the core category continually resolved the main concern, to record analytical progress and thoughts about the data and directions for further collection and/or analysis of data, to record thoughts or musings about the data collected as reasoned by Thornberg, (2012), Urquhart, (2013, p. 71) and Lempert (2007). Thus, memos served as the analytic link between data and the emergent theory (Glaser, 1978; Lempert, 2007; Urquhart, 2013). The process of formulating the theory for presentation was helped by sorting memos, which in essence (Glaser, 2014, p. 76) is sorting of ideas generated during data analysis. Although memos were also written during sorting, Hakel, (2015) said those were memos on memos, whose effect was to, as Holton, (2010) put it, further condense the theory. Through sorting of memos the theory developed as ideas were ordered and relevant literature was integrated into the theory. Sorting of memos was based on the presence of similarities, links and inherent uniformities between memos and the exact location (in the sorted memo collection) of the memo was based on the theoretical coding of data on which the memo was based. etheoretical outline, like many GTM outlines (Glaser, 2004, 2014; Holton, 2010) was a result of sorted memos. Thus full specification of the theory came through an integrated set of hypotheses (Glaser, 2004) that emerged from sorted memos. In writing the memos I applied theoretical sensitivity abilities, in order to make it manageable to translate ideation on data, codes and categories into theory.

Theoretical sensitivity enabled me to generate theoretical concepts from data and relate the concepts according to acceptable models of theory. As it is meant to be in GTM literature (Glaser, 1978; Glaser & Holton, 2005) theoretical sensitivity meant having theoretical thought, and having sense enough to recognise the theory, and having sense enough to respond to the theory so as to develop it further. Theoretical sensitivity raised awareness of a number of possible coding families and avoided over-focusing on a single explanation (Glaser & Holton, 2005, p. 9); this increased openness in the research. Because of theoretical sensitivity, I was able to theoretically conceptualise and effect abstraction of ideations from various sources and types of data. Aside from Glaser's (1978, p. 3) and Glaser & Holton's (2005) discussions on theoretical sensitivity I found it sensible, fitting and effective to be theoretically sensitive in this study. Through theoretical sensitivity I reached theoretical saturation, which in GTM (Glaser, 1998, p. 158; Urquhart, 2013, p. 194) meant no new codes were emerging from the fresh data obtained for analysis. (See the memo on theoretical saturation in Appendix G). Accordingly, saturation signalled termination of new data collection on the particular category (Glaser, 2011; Morse, 2010).

3.8.3 Memos and not Direct Quotes: Basis for Coding

The use of classic-GTM allows the researcher to realise that unlike in most qualitative research, the use of direct quotes for illustration is not necessary and instead memos are sufficient. While Glaser (2014) extensively argues on why no direct quotes are necessary to illustrate concepts in classic-GTM, this section picks on parts of the argument in his writings. In classic-GTM, data is collected in the form of field notes written after interacting with research participants (Glaser, 1998, p. 107) and subsequent to this the researcher codes the data and simultaneously produces memos (Glaser, 1978, p. 83). By their nature, memos are "the theorising write-up about codes and their relationships as they strike the analyst while coding." (Glaser, 1978, p. 83) and they serve to illustrate ideas and subsume descriptions in data (Glaser, 2014, p. 125). And direct quotes are in the data, therefore when memos subsume the essence of data they subsume the quotes.

3.8.4 Open Coding of Data

I started the coding process with open coding because in GTM (Duchscher & Morgan, 2004; Glaser, 1978; Urquhart, 2013) it is the initialization phase of coding. Open coding together with selective coding are collectively known as substantive coding (Glaser, 1978). A number of rules guide open coding Glaser, (1978, p. 57) and the first rule demanded that I ask questions of the data, namely "What is this data a study of?", "What category or property of a category, of what part of the emerging theory, does this incident indicate?" and "What is actually happening in the data?". The second rule (Glaser, 1978, pp. 57–58; Holton, 2010, p. 24) required that data be analysed line-by-line accompanied by constant coding of each line. Line by line coding during open coding is meant to ensure verification and saturation of categories as well as minimising missing important categories (Glaser, 2004, p. 14) and I used *in vivo* codes to label codes (Glaser, 1978). An *in vivo* code is a term referring to labelling of codes while preserving the terminology of participants and as I was at it I used gerunds of the *in vivo* codes (Glaser, 2011). The third rule required me to do coding without hiring coders who need pre-set codes, of which there were none at this stage of data analysis. The fourth rule required me to interrupt coding to memo the ideas that came from reading the data (Glaser, 1978, p. 58; Holton, 2010, p. 24). A fifth rule (Glaser, 1978, pp. 59–60) with links to theoretical sampling required that I stayed within the boundaries of the substantive area and the field of study because drifting outside the substantive area would derail me from relevance, fit and workability. Lastly, I avoided preconceptions (Glaser, 1978, p. 60) about the analytic relevance of some variables like age, gender, social class, race, skin colour, or any other until they emerged to be relevant. However, I provided such description of persons and places guided by GTM (Glaser, 1978) merely to orient the reader with regard to where and to whom the research was done, noting that the process may occur elsewhere in place and population.

Following the rules outlined above I open coded the data in "every way possible" (Glaser, 1978, p. 56), which meant coding for all possible meanings, implied or otherwise by the data. Codes that resulted from open coding are substantive codes (Glaser, 1978, p. 55) because they conceptualised the empirical

essence of the substantive area. The findings are on what is happening in the data (see Chapter 4), what main concern is faced in the study and how the main concern is resolved (Glaser, 1998, p. 140). The issues attended to during open coding allowed me to remain theoretically sensitive and focus on what Glaser (2004) called patterns of incidents that result in codes. Open coding also determined the direction to take with theoretical sampling before moving on to selective coding process, where a particular problem is focussed on (Glaser, 2004, p. 14).

After sufficient open coding, all data as expected in GTM (Glaser, 1978, p. 60) indicated some category in the analysis. Open coding to outlined and corrected understanding of e-recruitment phenomenon and saturated categories that emerged, and it made me apply theoretical sensitivity and ability to apply GTM procedures and implement GTM rules.

3.8.5 Selective Coding of Data

The beginning of selective coding signalled the end of open coding and was an indication in the study as in other GTM studies (Holton, 2010, p. 31) that a core category had been identified. I observed that after identifying the core category I had by GTM logic (Glaser, 1992, p. 75) to delimit the coding to only those categories that related to the core category sufficiently to be used in a parsimonious theory. With selective coding I utilised the most important and/or frequent open codes to filter the data.

Relevant categories from open coding formed a theoretical frame for further data analysis and allowed for construction of relationships within the emerging theory as fully explained by Dey, (2007, pp. 168–169) for studies applying GTM. Consolidation of categories which consumed much of selective coding stopped when the categories were saturated, and when the theory was complete.

3.8.6 Theoretical Coding and Coding Families

The theoretical coding process (Cutcliffe, 2000; Glaser, 1978, 1998; Urquhart, 2013) resulted in theoretical codes, which described relations between categories. In theoretical coding I interpreted and sorted memos (See Appendix C for sample memo) while noting relations (theoretical codes) exposed in

the process (Glaser, 2013, p. 3). Coding families are a typology of relationships that can exist between categories and that may be used in theoretical coding (Glaser, 1978; Thornberg, 2012). Table 13 gives detailed descriptions of some theoretical coding families identified by Glaser (1978). Such coding families may be used in theoretical coding, however it is possible that additional coding families may also emerge in any single study (Glaser, 1992) Table 13 hence does not represent a comprehensive or final list of coding families.

Family Identity	**Description (Identifying attributes of the family)**
The Six C's	Represents Causes, Contexts, Contingencies, Consequences, Covariances, and Conditions
Process	Stages, staging, phases, phasings, progressions, passages, gradations, steps, rank, careers, orderings, trajectories, chains, sequencings, temporaling, shaping and cycling.
The Degree Family	Limit, range, intensity, extent, amount, polarity, extreme, boundary, rank, grades, continuum, probability, possibility, level, cutting points, critical juncture, statistical average (mean, medium, mode), deviation, standard deviation, exemplar, modicum, full, partial, almost, half and so forth.
The Dimension Family	Dimensions, elements, division, piece of, properties of, facet, slice, sector, portion, segment, part, aspect, section. Divides the notion of a whole into parts.
Type Family	Type, form, kinds, styles, classes, genre. Indication of variation in the whole.
The Strategy Family	Strategies, tactics, mechanisms, managed, way, manipulation, maneuverings, dealing with, handling, techniques, ploys, means, goals, arrangements, dominating, positioning.
Interactive Family	Mutual effects, reciprocity, mutual trajectory, mutual dependency, interdependence, interaction of effects, covariance.
Identity-Self Family	Self-image, self-concept, self-worth, self-evaluation, identity, social worth, self-realization, transformations of self, conversions of identity.
Cutting Point Family	Boundary, critical juncture, cutting point, turning point, breaking point, benchmark, division, cleavage, scales, in-out, intra-extra, tolerance levels, dichotomy, trichotomy, polychotomy, deviance and point of no return. This family is a variation of the degree family.
Means-Goal Family	End, purpose, goal, anticipated consequence, products. This is a sub-family of the Six C's and process families.
Cultural Family	Social norms, social values, social beliefs, and social sentiments. Social norms are aggregates of

Family Identity	Description (Identifying attributes of the family)
	rules, values aggregates of wishes or goals, beliefs aggregates of cognitions and sentiments aggregates of attitudes. The assumption is that personal characteristics are shared to a sufficient degree.
Consensus Family	Clusters, agreements, contrasts, definitions of the situation, uniformities, opinions, conflict, discensus, differential perception, cooperation, homogeneity-heterogeniety, conformity, non-conformity, and mutual expectation.
The Mainline Family	Social control, recruitment, socialization, stratification, status passage, social organization and social order, social institutions, social interaction, social worlds, social mobility and so forth.
Theoretical Family	Parsimony, scope, integration, density, conception level, relationship data, relationship to other theory, clarity, fit, relevance, modifiability, utility, condensability, inductive-deductive balance and inter-feeding, degree of multivariate structure, use of theoretical codes, interpretive, explanatory and predictive power and so forth.
Ordering or Elaboration Family	Structural, temporal and generality are the principal ways to order data.
Unit Family	Collective, group, nation, organisation, aggregate, situation, context, arena, social world, behavioural pattern, territorial units, society, family, etc and positional units: status, role, role relationship, status set, role set, person set, role partners.
Reading Family	Concepts, problems and hypotheses.
Models	Modelling one's theory pictorially by either a linear model or a property space.

Table 13: Coding Families (Glaser, 1978, p. 74-82)

3.9 Ascertaining Quality of the GTM Process

High quality GTM studies fit the data, work in the studied substantive area, are relevant for the study and allow for modifications to be made to the procedures and their outcomes based on data (Glaser, 1978, 1998). Therefore, in this section I explain how fit, workability, relevancy and modifiability were ensured in this study.

3.9.1 Ascertaining Fit

My effort to ascertain fit included in vivo coding, avoidance of preconception and transparency in all GTM steps. Fit means that each of the concepts adequately reflects the data it purports to represent (Glaser, 1978, 1998), thus fit was ascertained between categories and data from which categories emerged. I ascertained fit by seeking and collecting relevant data through constant comparison and theoretical sampling respectively instead of forcing concepts on data or preconceiving concepts for collected data. I also stayed theoretically sensitive as the theory emerged, thus I was able to render theoretically the emergent categories and obtain a theory that is a true fit to the phenomenon of e-recruitment.

3.9.2 Ascertaining Workability

In the study I constantly monitored how the core category resolved the main concern, because in GTM it is sensible for the emergent grounded theory to clearly explain what is happening in the phenomenon, and the process of how it is happening, and this should enable prediction of future behaviour. In short, I persistently monitored whether the emergent theory worked in the substantive area.

3.9.3 Ascertaining Relevance

The relevance of the core category is evidenced by its reception by the members who are party to the studied phenomenon (phenomenon from which data was collected). Constant interaction with respondents in the research as the core category emerged enabled the ascertaining of relevance of the core category and the emerging theory. Glaser, (1998) realised that in many cases prior to the research, respondents would be unable to articulate their main concern, but on receiving feedback on the research they should instantly be able to recognize the emerged core category as being authentic or true to their situation.

3.9.4 Ascertaining Modifiability

A modifiable grounded theory is one that other researchers can make adjustments to or refine as they collect and code new data with the validity of the theory persisting. Transparency in GTM goes a long

way in ascertaining modifiability of a grounded theory and it was upheld throughout the research because other researchers may need to seek clues from the development process of the theory in order to be able to modify it. However, questions on the legitimacy and accuracy of the evidence in GTM arise based on assumption of accuracy in the collection of data as a requirement for accurate, reliable and legitimate research (Ndume, Tilya, & Twaakyondo, 2008). A logical response and Glaser's, (2011, p. 60) response is that "This is a pure qualitative data analysis (QDA) worrisome accuracy, evidence/proof request appropriate to description and findings. It is NOT appropriate to the conceptual abstraction of grounded theory methodology which is abstraction from time, place and people and a concept readily modifiable from constant comparison of indicators. The GTM researcher can give illustrative help citing one indicator among many, but in moderation so it will not block reader's flow with the concepts and their trust in the author and his skill."

3.10 Ethics

Research ethics in phenomena dominated by traditional interactions between research participants are fairly discussed in literature (Bassett & O'Riordan, 2002; Buchanan & Ess, 2008; Ryen, 2008; Walther, 2002). On the other hand online interactions which allow third parties to have access to data on such interactions present ethical challenges because of the blurred distinction between perceived private data and data in the public domain (Buchanan & Ess, 2008; Vaast & Levina, 2015; Zimmer, 2010). Ethics in a study refers to how the study aligns with ideas of right and wrong (Zimmer, 2010). Privacy, confidentiality, security (Bélanger & Crossler, 2011; Gostin et al., 1993; Moore, 2011, 2016; Wolffers, 1996), informed consent (Kraut et al., 2004; Shuchman, 2014) and morals (Hauser, Cushman, Young, Kang-Xing Jin, & Mikhail, 2007; McLaren, 2001) were some of the ethical issues to consider.

Privacy has many definitions and I considered various definitions that participants in the study could possibly have and those outlined in literature and the laws of the land (Moore, 2016) in order to adopt relevant measures for the sake of privacy. I recognised that confidentiality is closely associated with

privacy (Moore, 2016) and some of the measures I took for privacy enhanced confidentiality. In pursuit of privacy I used pseudonyms to identify participants (see Appendix A) in the research and of course I was to avoid communicating their identities in a way that compromised their privacy. All confidential data surfaced during data collection was not used or exposed. I encouraged participants to inform me of any privacy or confidentiality concerns they may have.

Security is another concern participants in research sometimes have (Gostin et al., 1993; Moore, 2011) and in this research I took measures to avoid endangering participants in this research. I had to identify risks related to the study and put measures in place to curb against such. Potential harm included recruitment scams (Gabriel & Macdonald, 2018), online impersonations (Vilardo, 2004), fraud (Mahbub & Pardede, 2018; Vidros et al., 2016), cyber-victimisation and so on. These risks were avoided by working on secure information systems and the achievement of privacy and confidentiality in the research.

Informed consent to take part in a study is one ethical consideration in a study like this. To obtain informed consent, participants are given the relevant details of the research to enable them to understand the risks or benefits associated with participating in the research (Shuchman, 2014). For effective implementation of the practice of informed consent I was guided by the understanding of norms and practices of research participants, and Molyneux et al., (2010) noted that it was essential to know the norms and practices of the researched community.

In the study there were other moral issues that needed attention aside from the issues described above e.g. issues of respect for persons, beneficence, justice, and local etiquette (Gyure et al., 2014), which are unique to every community. Respect for persons means having courteous regard for them, beneficence means doing good, justice refers to being just and fair, while local etiquette refers to a community's rules governing socially acceptable behaviour (Gyure et al., 2014).

3.11 Summary of the Chapter

This chapter started with an introduction followed by a discussion of the interpretive philosophical paradigm. The chapter then focused on GTM used in this study with a discussion on GTM principles, GTM procedures. The other sections focused on data collection, data analysis, ascertaining quality of the GTM process and ethics in the research. Data collection was made up of interviews, observation and secondary data. 27 job seekers were interviewed, some multiple times. Three recruitment agencies were also used as sources of data. Interviews were conducted with representatives from two of the three agencies as in Appendix A. Other data about recruitment agencies was obtained from their websites, social media presence, and job seekers' experiences with recruitment agencies. Hence overall the jobseekers were the predominant source of data.

CHAPTER 4: FINDINGS ON JOBSEEKER DATA

4.1 Introduction

This chapter starts by describing the jobseekers (See Section 4.2) who participated in the research. Next it discusses *objects of concern* (see Section 4.3) for jobseekers as they emerged from the data. It then presents the emergence of categories, namely *interpreting fit* (See Section 4.4 for definition and derivation) and *positioning for fit* (See Section 4.5 for definition and derivation) on e-recruitment, based on data collected on the participating jobseekers. Although derivation of categories was bottom-up from data to codes to categories, the presentation in this chapter starts by giving the hierarchy and definition of categories and their constituent subcategories beforehand and then goes on to show how they emerged. The full hierarchy of categories is presented in Appendix H. The chapter gives a brief outline of the purpose of jobseekers' behaviour (See Section 4.6) and then closes with a summary.

4.2 The Jobseekers

The abridged list of jobseekers is given in Appendix A. This section presents details on each of the jobseekers without compromising their privacy and confidentiality. Pseudonyms are used to identify the jobseekers.

Twenty-seven (27) jobseekers took part in providing data during the period starting 2 March 2015 and ending 27 October 2015. At the initiation of data collection, I deliberately targeted jobseekers that were literate in information technology because this study is on e-recruitment. To give the reader an overview of the jobseekers, I describe them one after another.

Vekarapi, a university lecturer whose highest qualification was a Doctor of Philosophy was the first to be interviewed on 2 March 2015. He also held a degree in Computer Science. Vekarapi was an expatriate working in Namibia and since his arrival; he applied for jobs in other organizations within and outside the

country. Vekarapi indicated that his current contract of employment was valid for three years, so he was not stable at his current job.

Casper had the first interview with me on 17 March 2015. Casper's formal qualifications at the time of the interview were a Diploma, an undergraduate degree and he was close to completing another undergraduate degree for which he attended evening classes at a local university. Another interview with Casper occurred on 28 May 2015. He was in his late twenties, and seeking progression in his career. I wanted to know if Casper had dependents, but Casper steered away from the question.

Quinton was holding on to unstable employment in information technology on 15 June 2015 when he gave the first interview to me. He had a Diploma and a Bachelor's degree and was making progress with his Honours degree at the time of the interview. At the time of finishing this research he was in the employ of a financial institution, had finished his Honours degree, had bought his first car and he said he was happy at that moment. Quinton was in his early twenties and had no dependants.

Loice and I had one interview on 23 April 2015. Her education included professional certificates and a Bachelor's degree completed in 2014. She was self-employed at the time of the first interview and was not comfortable with the uncertainties of self-employment. During the second interview, she revealed that she had a job offer and she was hoping to receive more invitations for job interviews. Yet she had an air of one keen on self-employment rather than formal employment. Loice was in her early thirties and a single mother of one child.

John had one interview with me on 12 May 2015 and he had completed his Bachelor's degree (Honours) in 2014. He was in the employ of a small start-up company, and in his late twenties. I had sporadically met him before the interviews and he came across as one whose stance on job seeking was that he did not worry too much about it because he had many 'connections'.

Hangula was a prolific job hunter at the time of the only interview she had with me on 19 May 2015. She was a holder of a Bachelor's degree and had worked for at least three organizations before the interview with me. She later became unavailable for interviews. At the time of writing this thesis, Hangula was in her mid-twenties and she was happy in her job but she still looked out for better opportunities.

I had an interview with Saara on 18 March 2015. Saara was in the process of finishing her Bachelor's degree and wanted employment in order to supplement the loan she was getting from government.

My interview with Kauna was on 2 April 2015. Her formal education included a Diploma and a Bachelor's degree. She was in the final stages of her Honours degree when the interview occurred. She later became unavailable for further interviews but in the last quarter of the year 2016, she communicated that she had found permanent employment in government. Kauna was in her mid-twenties in the year 2017.

Kandombo was in her mid-twenties when I interviewed her on 10 April 2015. She was yet to finish her Bachelor's degree. Her university once assisted her in getting internship, and on her own she managed to get similar internships at least once. I did not get an update on Kandombo after the interview.

Josephine and I had an interview on 29 April 2015, 30 April 2015 and 27 May 2015. Josephine did not have any formal educational qualification beyond secondary school, but she had enrolled for a Diploma in information technology at the beginning of the year. She liked information technology, and sought for any job especially in financial institutions. Josephine was in her early twenties at the time of the interviews.

Shivute was a man in his early twenties when I had interviews with him on 30 April 2015, 1 June 2015 and on 10 October 2015. His formal education was a secondary school certificate and he was in the final year of his Bachelor's degree. Although his primary goal was to get internship, he was also open to permanent job offers.

Mandume and me had interviews on 30 April 2015 and 26 October 2015. Mandume was in his early twenties at that time and fresh out of college with a Bachelor's degree and hope. Yet nothing concrete in the form of employment had come his way. As I continued with the research, Mandume updated him via social media that he was a trainee in one of the international financial institutions.

Penehafo and me had interviews on 2 May 2015 and 1 June 2015. Penehafo had a Diploma at the time of interviewing and she was enrolled for a Bachelor's degree. She was a very avid consumer of information technologies like many people in her age group (twenties), she was looking for employment with a plan to continue her studies on a part-time basis.

Shilongo had interviews with me on 5 May 2015 and on 2 June 2015. Shilongo was in the final year of her Bachelor's degree, and at the time of the interviews, she was on internship, which was part of her university degree's curriculum. Shilongo was due to finish her internship in July 2015 and possibly finish her Bachelor's degree in the same year.

Kazembiri lived with her mother in Rundu, more than700 kilometres northeast of Windhoek. She graduated in 2014 with a Bachelor's degree and on 5 May 2015, I had an interview with her. She was in her mid-twenties, unemployed and single.

On 6 May 2015, 3 June 2015 and 21 October 2015 I had interviews with Amukwaya, a Bachelor's degree holder since 2014, whose residence was in Windhoek. When I interviewed her on 6 May 2015, she was unemployed; on 21 October 2015, she was part of the working labour force. Amukwaya was in her mid-twenties with no dependants.

Kapenda lived in Otjiwarongo, a town approximately 200 kilometres to the north of Windhoek. She lived with her civil servant parents, and her younger siblings, like her, were dependent on the parents. She graduated in 2014 with a Bachelor's degree and on 7 May 2015, 15 June 2015 and 20 October 2015 I interviewed her. She was in her mid-twenties and single and one would presume that she had no

dependants; however, she alluded during one of the interviews that she hoped to help her parents and siblings when she finds employment.

Lizel had been working in Windhoek for at least two years when I interviewed her on 30 April 2015 and 27 May 2015. She graduated from university with a Bachelor's degree in 2011 and Honours degree in 2014. During her time as a university student, she was offered a scholarship on condition that she would work for the offering organization on completing her studies. She accepted the offer and joined the organization on completion of her studies. However, she kept looking for better employment opportunities. Lizel was a mother of one and she was in her late twenties at the time of the interviews.

Koch and I had an interview on 8 May 2015. He gave as little information as he could during the interview. Koch had a secondary school certificate (Grade 12) and was in his early twenties when the interview occurred.

On 3 June 2015, 20 October 2015 and 21 October 2015 I interviewed Ndapewa, who graduated in 2015 with a Bachelor's degree. She was unemployed and still living with relatives at the time of the interviews. She was born and grew up in Windhoek, and had never been out of Windhoek for more than a month in her life. She was in her mid-twenties at the time of interviewing.

Peneyambeko allowed for interviews on 3 June 2015 and on 21 October 2015; she was in the final year of her Bachelor's degree and had never worked except doing internship, which was mandatory in her studies. She graduated in early 2016.

I interviewed Hafeni and Paulina once each on 20 October 2015 and 26 October 2015 respectively. Hafeni, a man and Paulina, a woman were both in their mid-twenties, single and living with relatives.

One other man trying to get himself out of unemployment was Ndilinawa. This pseudonym means 'I am fine', in the local Oshiwambo language, but he was not fine; many times he had gone online to look for work without success, he had visited employers' premises and gone to recruitment agencies but he could

not find a job. Interviews between me and Ndilinawa occurred on 4 June 2015 and 20 October 2015. Ndilinawa was in his late twenties at the time of the interviews.

On 4 June 2015 and twice on 20 October 2015 I had interviews with Namupala who was at the time studying for a Bachelor's degree. He was looking for employment to support his studies, reasoning that having working experience by the time he finishes his studies would give him competitive advantage in the job market when he finished his studies.

Hailonga's interview with me came on 15 June 2015; another interview was on 27 October 2015. In the intervening time between the interviews, Hailonga got a job in one of the government's companies. He was in his mid-twenties and in the second year of his Bachelor's degree studies.

Like many who consented to taking part in the research, Shakela was in her mid-twenties when I interviewed her on 27 October 2015. She originally came from Oshakati, a town north of Windhoek, and was working and studying at the same time. She never used a recruitment agency in searching for a job, but relied on social media to look for employment and found Facebook to be the most helpful, as people shared vacancies and organizations used social media to publicise their vacancies.

4.3 Objects of Concern for Jobseekers

Objects of concern are constructs about which jobseekers act in resolving the main concern (*fit*) (See Sections 4.4.1 and 4.4.2). The label '*objects of concern*' was used in this study to refer to *information technology*, *jobseeker*, *job* and *job provider* after it emerged that jobseekers' behaviour in this research revolved around how the four of them fit. The labelling was a retrospective process. I did not preconceive that these four *objects of concern* existed or were essential in resolving jobseekers' concerns.

4.3.1 Attributes of Objects of concern

Attributes of *objects of concern* either are intrinsic (*intrinsic attributes of objects of concern*) or constructed (*constructed attributes of objects of concern*). *Intrinsic attributes of objects of concern* are

constant e.g. attibutes of the *objects of concern* which exist, on the other hand *constructed attributes of objects of concern* are the outcome of interpretation e.g. likeability (the jobseeker can be likeable or not likeable depending on the assessor of likeability) (see section 4.4). Interpretation results in assignation of values to properties of the attributes of objects of concern. Figure 5 is a conceptual depiction of an *object of concern* and its attributes, in which the *object of concern* has attributes Attribute 1, Attribute 2, Attribute 3 until Attribute *n* where *n* is an arbitrary whole number indicating the number of attributes of the *object of concern*.

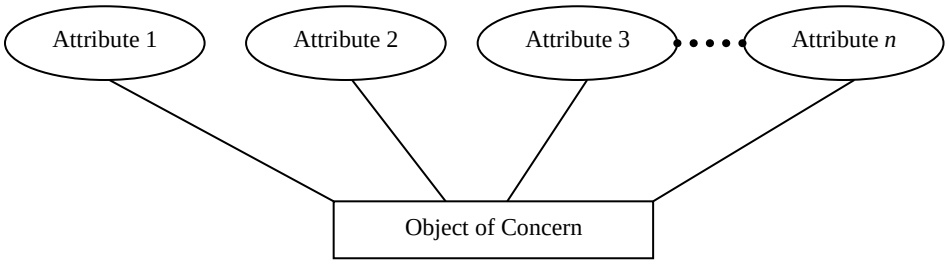


Figure 5: Object of Concern and its Attributes

Each attribute can have a range of values, which it can take (e.g. for the *object of concern* called jobseeker, the attribute called 'qualification' can have values like certificate, diploma, degree, etc).

4.4 Derivation of Interpreting Fit

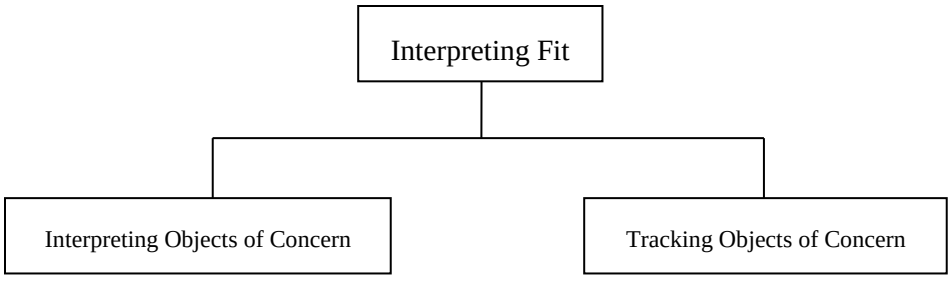


Figure 6: Subcategories of Interpreting Fit - Jobseekers

Interpreting fit is a process by which jobseekers gave meaning to the main concern (*fit*) in e-recruitment. Two subcategories of *interpreting fit* emerged from the data, namely *interpreting objects of concern* and *tracking objects of concern* (see Figure 6).

According to jobseekers, fit occurs when objects of concern (*jobseeker, job, job provider* and *information technology*) have suitable values in their properties. The jobseeker has to be content with values in his/her properties relative to the specifications of a job, and be content with values in his/her properties relative to the job provider's and be content with values in his/her properties relative to the information technology. *Objects of concern* have properties to which values are attachable.

Interpreting objects of concern is a process by which jobseekers assign values to the properties of *objects of concern*. Data used by jobseekers informs them on values they assign to properties of *objects of concern*. *Interpreting objects of concern* also defines how jobseekers measure the status of *objects of concern* against ideal values of fit.

When necessary, jobseekers have the capacity to change values of properties for some objects of concern when those values lack fit with ideal values. Jobseekers change values of properties of objects of concern through a process of *tracking objects of concern*. While jobseekers have capacity to *track objects of concern* by changing properties on themselves and information technology, they rarely have capacity to change values of properties of jobs and job providers. If changing values of properties is beyond the capacity of jobseekers, they search for an alternative *object of concern* (e.g. another information technology) with desirable property values. *Interpreting fit* captures the aggregate process of *interpreting objects of concern* and *tracking objects of concern*.

There was little if any training on job-hunting for the jobseekers and much of what they did was through interpreting the appropriate action to perform, possibly based on previous experiences, experiences related by others, interpretation of situations, or intuition.

Table 14 presents the inventory of categories that define *interpreting fit*. In this case, starting concepts are open codes, followed by high abstraction levels through open categories namely *Interpreting Objects of concern* and *Tracking Objects of concern*, which constitute categories of *Interpreting Fit*. Thus, the first column of Table 14 has open codes, second column has subcategories, and third column has the category.

Open Codes *(The next section will show how these emerged)*	**Subcategories of Interpreting Fit**	**Category**
information technology use is convenient, information technology is efficient, information technology defines modernity, traditional approach is viable, traditional approaches are effective, blend of traditional and technological approaches is effective, information technology is restrictive	Interpreting Objects of Concern (Or Interpreting jobseeker, job, job provider and information technology)	Interpreting Fit
	Tracking Objects of Concern	

Table 14: Derivation of Interpreting Fit (Jobseekers)

In the following subsections, I explain the subcategories, namely *Interpreting Objects of concern* and *Tracking Objects of concern*. When data provides an indicator to an open code, I will write down the label for the open code and underline it, additionally I write down a short description of the corresponding indicator (e.g. *label of open code – description of indicator*).

4.4.1 Interpreting Objects of Concern

The collective or main story of jobseekers includes how they interpreted objects of concern. *Interpreting objects of concern* has four subcategories, namely *interpreting information technology*; *interpreting the job*, *interpreting the job provider*, and *interpreting the jobseeker* (see Figure 7 and Appendix H). This section provides details on the emergence of codes from data on jobseekers. Appendix H gives more details on how open codes resulted in the category *interpreting objects of concern* and its subcategories.

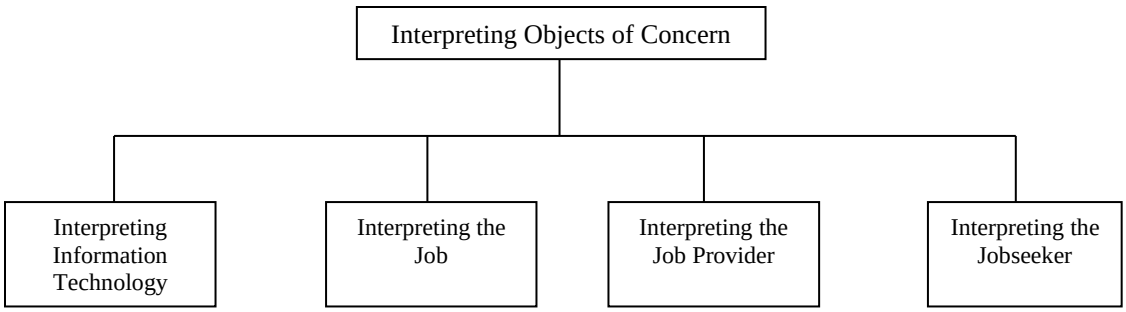


Figure 7: Subcategories of Interpreting Objects of Concern - Jobseekers

4.4.1.1 Interpreting information technology

Mandume started job-hunting after attaining a Diploma in information technology at university. He was dropping off curriculum vitae and other documents physically at the various offices of recruiting organizations and he realised he was spending a lot of time moving from place to place when he could submit applications online (*traditional approach is inconvenient - interpreting information technology*). He then switched to online job-hunting after reasoning that it was more economic in terms of time and other resources than traditional approaches (*information technology use is convenient - interpreting information technology*). He said he realised that with online job-hunting at times replies were immediate (*information technology is efficient - interpreting information technology*). Added to immediate responses Mandume added that online systems were fair in management of large volumes of applications (*information technology is fair - interpreting information technology*). As an exemplar of immediate response after applying for a job, Mandume told of his application for a job in one mobile phone network provider, which the provider responded to immediately (*information technology is efficient - interpreting information technology*). Mandume also said mobile phone network providers seek to be at the cutting edge of information technology more than other industries and that way they exude modernity (*information technology defines modernity - interpreting information technology*).

Mandume and other jobseekers e.g. Kandombo, Kapenda, Lizel, John, and others used an online service which presented a number of vacancies from different organizations (*information technology use is convenient - interpreting information technology*) and they had to request to apply for the jobs. Upon

request, the administrators of the website communicated the status of the application to the applicant via email or the applicant's account on the website. After that stage, administrators would use traditional means including face-to-face meetings if necessary (*information technology leads to traditional approaches* - *interpreting information technology*) for further interaction with the jobseekers.

Hangula's incessant application for job positions using information technologies resulted in him being invited to face-to-face interviews with recruiters (*information technology-aided approach is viable* - *interpreting information technology*). Jobseekers supported their blending of recruitment approaches by saying the online system did not provide them the freedom to convince the employer of their potential because the questions were pre-set and restrictive (*information technology is restrictive* - *interpreting information technology*). Jobseekers (Amukwaya, Chris, Hafeni, and Hailonga) said that online systems sometimes left them wishing the system would give them ample space to sell themselves to recruiters for jobs on offer (*information technology is restrictive* - *interpreting information technology*).

Josephine, Kandombo, Mandume and Kauna indicated that their sources of job advertisements were newspapers, online job boards, and traditional social networks (*information technology helps recruitment* - *interpreting information technology*). They found newspapers to be helpful and they preferred job advertisements that redirected them to some Internet platform for more details and application tools (*information technology helps in recruitment* – *interpreting information technology*). In fact, they asserted that electronic means were taking over functions of the physical post office (*information technology is replacing traditional means* - *interpreting information technology*).

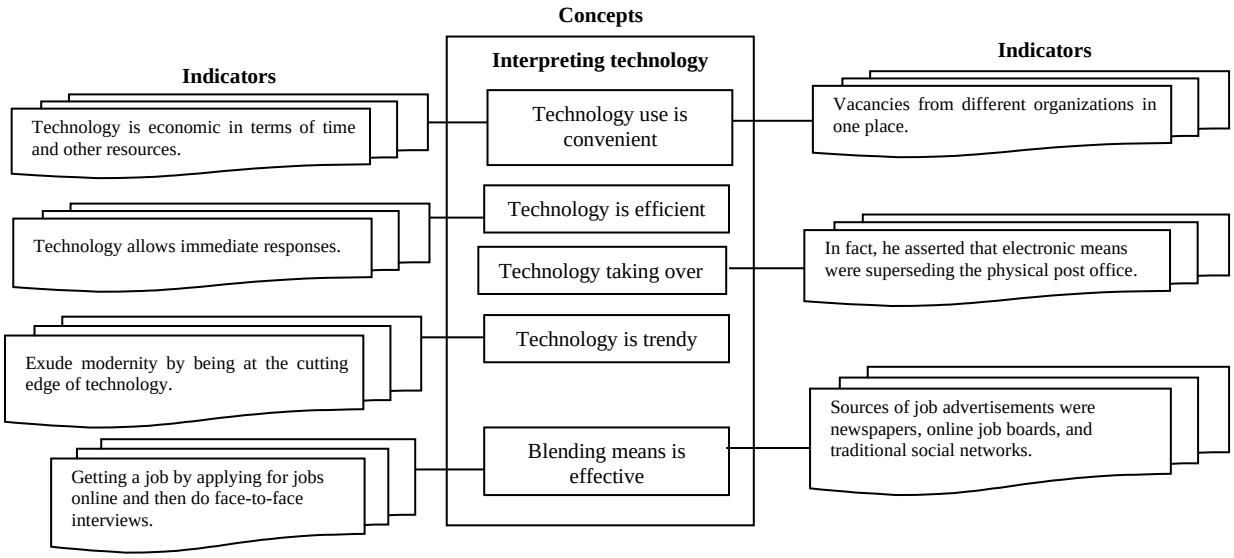


Figure 8: Derivation of Interpreting Information Technology

By using the concept-indicator model (Glaser, 1978, p. 62) I diagrammatically (see Figure 8), show how indicators in data led to codes and codes led to the open category *Interpreting information technology*. In addition to Figure 8, Appendix H gives further details on codes on interpreting technology.

4.4.1.2 Interpreting the job

Some jobseekers settled for internships, like Mandume who said he had found somewhere to go and spend the day, it was not a job in the sense he understood a job (*job not fitting jobseeker perception* - *interpreting the job*) but more like an internship. He pointed out that what he was earning per month at his current job could not get him through the month (*job does not fit jobseeker's wants* - *interpreting job*). Other jobseekers were also in the same situation (see Appendix H). Figure 9 captures how open/initial codes resulted in derivation of interpreting fit.

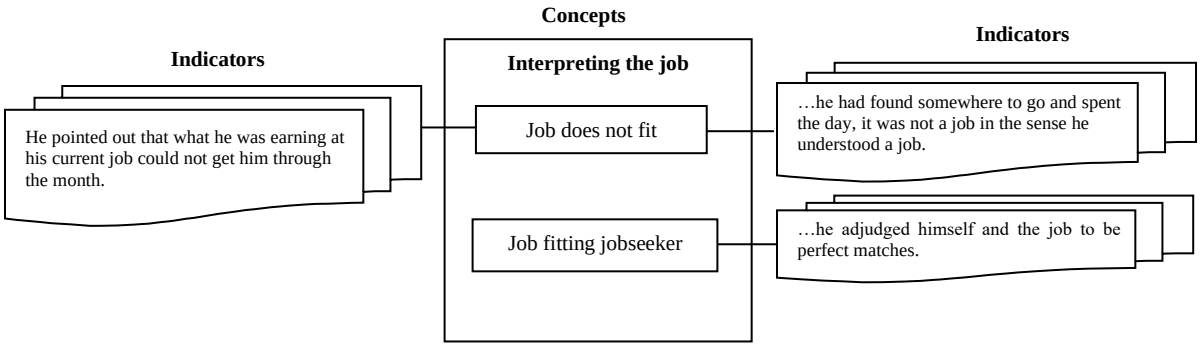


Figure 9: Derivation of Interpreting the Job

4.4.1.3 Interpreting the job provider

Kandombo, Kazembiri and Namupala reasoned that when recruitment websites' administrators use traditional means of interaction, they will be trying to know more about the applicant (*job provider wants to know* - *interpreting job provider*). Jobseekers provided information to website administrators in the hope that availability of such information to job providers would improve the jobseeker's chances of recruitment. But still jobseekers (Mandume, Hangula, John and Josephine) supported blending of recruitment approaches by saying the online system did not provide them the freedom to convince the employer of their potential because the questions were pre-set and restrictive (*job provider is restricting* - *interpreting the job provider*). On seeing some job advertisements, they said they felt like the recruiters had designed the job specifications to fit the jobseekers' individual profiles (*job provider is helpful* - *interpreting the job provider*), hence the need for space to convince the recruiter to hire them. Unlike jobseekers who needed space to convince the recruiters, certain groups of people (e.g. previously disadvantaged people) were encouraged to apply for some jobs by the job providers, and Mandume's perspective on encouraging certain groups of people to apply in job advertisements implied a biased recruitment process (*job provider biasing* - *interpreting job provider*). Koch, Lizel, Loice and other jobseekers, also expressed suspicion of biased recruitment, and believed that such bias prevented them from being recruited. Lack of working experience was also indicated as a contributing factor in reducing the jobseekers' chances of recruitment (*job provider wanting experienced jobseekers* - *interpreting job*

provider). However, Shakela and Shilongo reasoned that there is a possibility of employers employing someone who does not have experience when ideal applicants are unavailable or as part of internship, (*job provider is helpful* - *interpreting job provider*). Figure 10 shows how indicators contributed to the derivation of *interpreting job provider*.

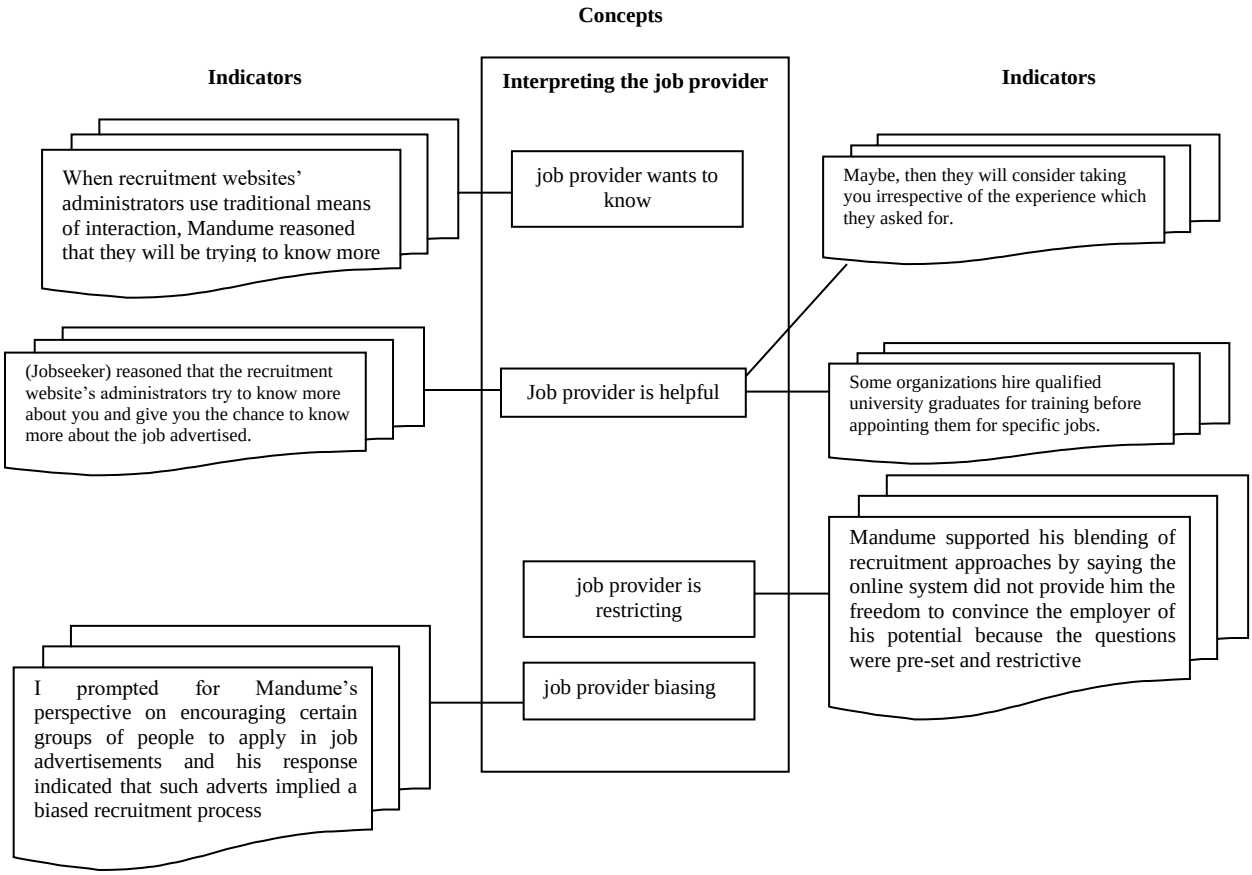


Figure 10: Derivation of interpreting the job provider (Jobseekers)

4.4.1.4 Interpreting the jobseeker

All jobseekers conveyed their employment status (*jobseeker stating position* - *interpreting jobseeker*). They also gave information on what they wanted to benefit from interaction with information technology and a job (*recognising own wants/needs* - *interpreting jobseeker*). Jobseekers' needs and wants were not always met, and they had to compromise e.g. Mandume was staying at a job for the experience (*wanting experience* - *interpreting jobseeker*) he was gaining from the job, which would support his ongoing job

hunt as job providers wanted people with experience to fill their job vacancies. Penehafo, Peneyambeko, Quinton and Saara among other jobseekers asserted having acquired knowledge (*jobseeker is knowledgeable* - *interpreting jobseeker*) and skills from practical subjects (*jobseeker is skilled* - *interpreting jobseeker*) during their academic training. However, Shivute said knowledge attained in class and skills associated with practical subjects do not compare to what he would get from working in the environment of employment. Shivute felt his skills attained at university were not enough until they were tested and improved when he gets a job or internship (*jobseeker is inexperienced* - *interpreting jobseeker*). But, both Mandume and Shivute indicated that their academic training influenced their preference for electronic communication in recruitment to the traditional post office alternatives (*jobseeker prefers electronic communication* - *interpreting jobseeker*). Figure 11 gives a schematic diagram summary of derivation of *interpreting the jobseeker*.

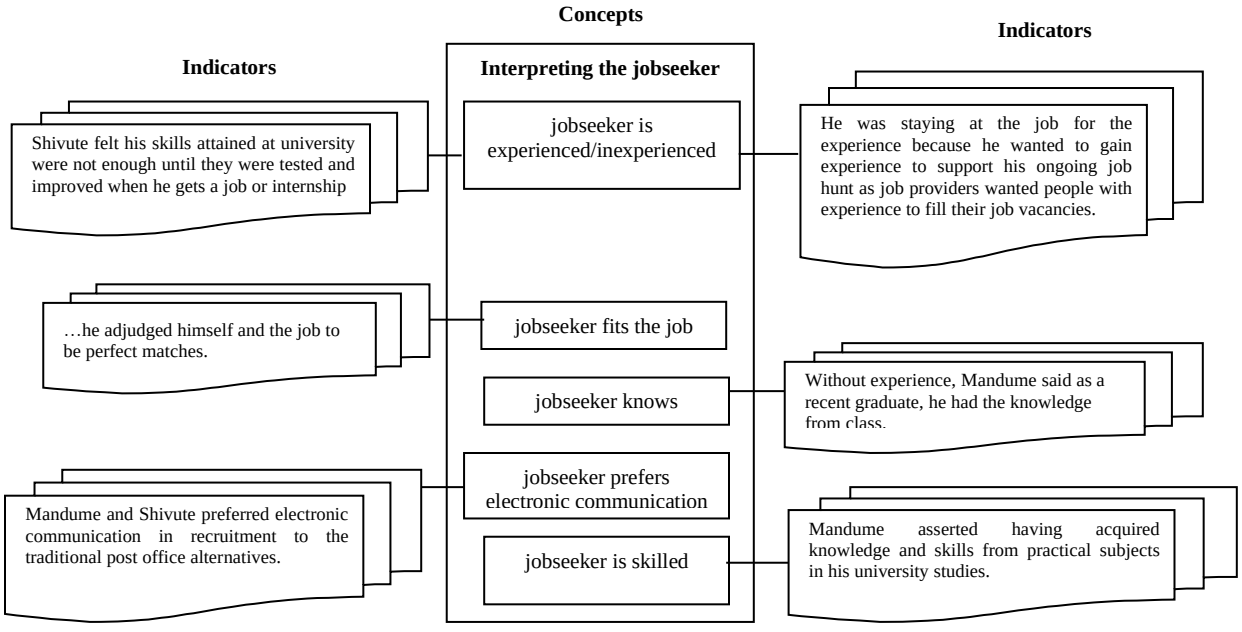


Figure 11: Derivation of Interpreting the Jobseeker

4.4.2 Tracking Objects of Concern

After deriving the category of *interpreting objects of concern*, I observed indicators in the data showing how jobseekers tried to adjust their current state or the state of other *objects of concern* to meet specifications of a job or nature of *job provider*. The category that captures the process by which *objects of concern* align to the *information technology* of recruitment (t*racking the information technology*), the *job* on offer (*tracking the job*) and *job provider* (*tracking the provider*) is *tracking objects of concern*. Figure 12 shows *tracking objects of concern* and its subcategories.

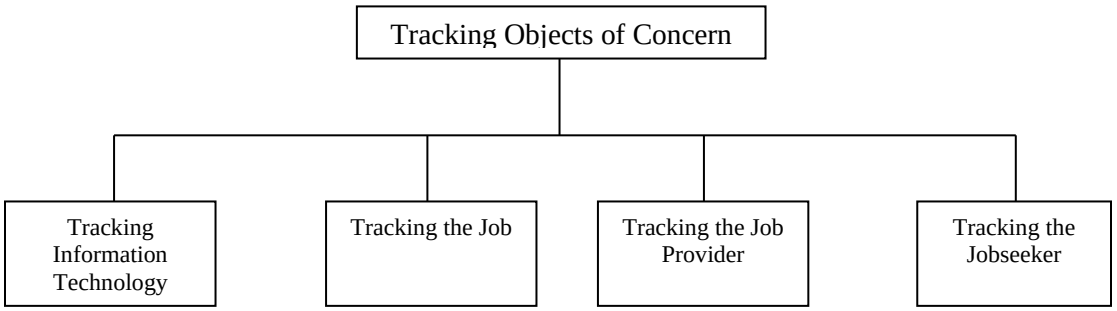


Figure 12: Subcategories of Tracking Objects of Concern - Jobseekers

4.4.2.1 Tracking information technology

Jobseekers indicated processes related to their pursuit of relevant, effective and affordable information technologies. Shilongo bemoaned jobseekers' limited access to the Internet because its costs were beyond their financial means (*noting the necessity of information technology-tracking information technology*). She pointed out that the inaccessibility of the Internet results in jobseekers missing opportunities. According to Peneyambeko, jobseekers overcome this by checking for advertisements in newspapers before going online if directed by job advertisements in newspapers (*job redirecting jobseeker to information technology - tracking information technology*). However, Kapenda, whose home was in Katima Mulilo, which is approximately 1200km northeast of Windhoek (Namibia's capital city, which in general provides much employment opportunities) said popular newspapers in the country came to Katima Mulilo on Mondays, Wednesdays and Fridays only. Kapenda said jobseekers in remote locations overcame the inaccessibility of newspapers by having job advertisements in newspapers sent to them by

friends and relatives via email or WhatsApp (*channelling to information technology - tracking information technology*). Kapenda moved to Otjiwarongo to improve her access to information technology (*moulding – tracking the information technology*) and better her chances of recruitment success since Otjiwarongo is only less than three hundred kilometres from Windhoek. Thus, jobseekers go where the information is, and according to Kauna, there is no loyalty to a specific information technology (*selecting information technology – tracking information technology*), technologies are used as long as she gets to where the jobs are. Figure 13 is a schematic diagram to capture the derivation of tracking information technology.

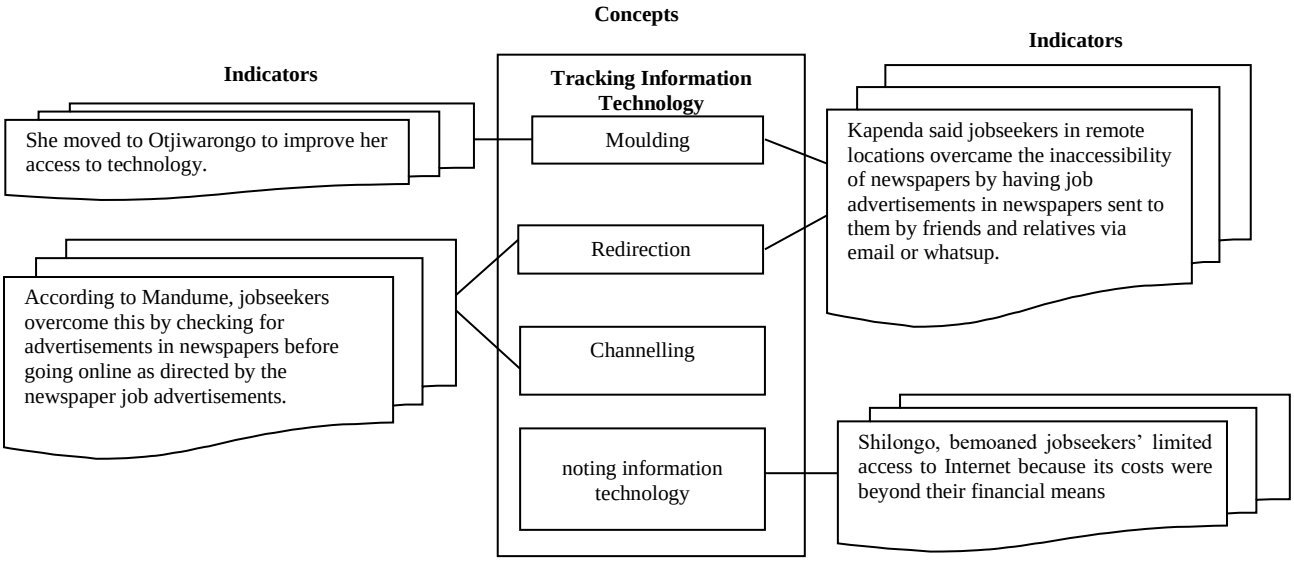


Figure 13: Derivation of Tracking Information technology (Jobseekers)

4.4.2.2 Tracking the job

Kapenda, like many other jobseekers in this research, mentioned the lack of feedback after having applied for jobs, but she had a way of getting feedback. When the recruiter's feedback did not come as expected, Kapenda visited the linkedIn.com platform to check if any of the other jobseekers indicated that he/she got the job (*networking - tracking the job*). I also noted that connected members on linkedIn.com get notifications when an individual in their network has a new job (*networking - tracking the job*). Thus, jobseekers go where the information is.

Many jobseekers had concerns about meeting specifications of an ideal candidate given in job advertisements. The recruiter inevitably turned down jobseekers who did not meet the specifications in the advertised job. In cases where she did not get recruited, Lizel wanted to know why she had not been recruited because she would use such information to improve her job seeking efforts (*moulding* - *tracking the job*). *Moulding* is a process, which resulted in objects of concern improving their value in the recruitment process. Lizel was an employee of a large organization as I mentioned earlier and when the organisation appointed her to a new post in the same organization, she started planning to get certifications relevant to her new appointment, which she said would give her required experience in her job-hunting (*moulding* - *tracking the job*). Although she was employed, Lizel kept looking for employment in other organisations as she reasoned that her experience would give her a chance at getting a better job than her current one (*recycling experience* - *tracking the job*).

Kauna considers the use of online means to hunt for jobs as a matter of-course but she says there are extra requirements like driver's licence requirement that comes often in the job vacancies she sees and as such she was working on getting her driver's licence (*moulding* - *tracking the job*). Figure 14 shows the derivation of *tracking the job* using data on jobseekers.

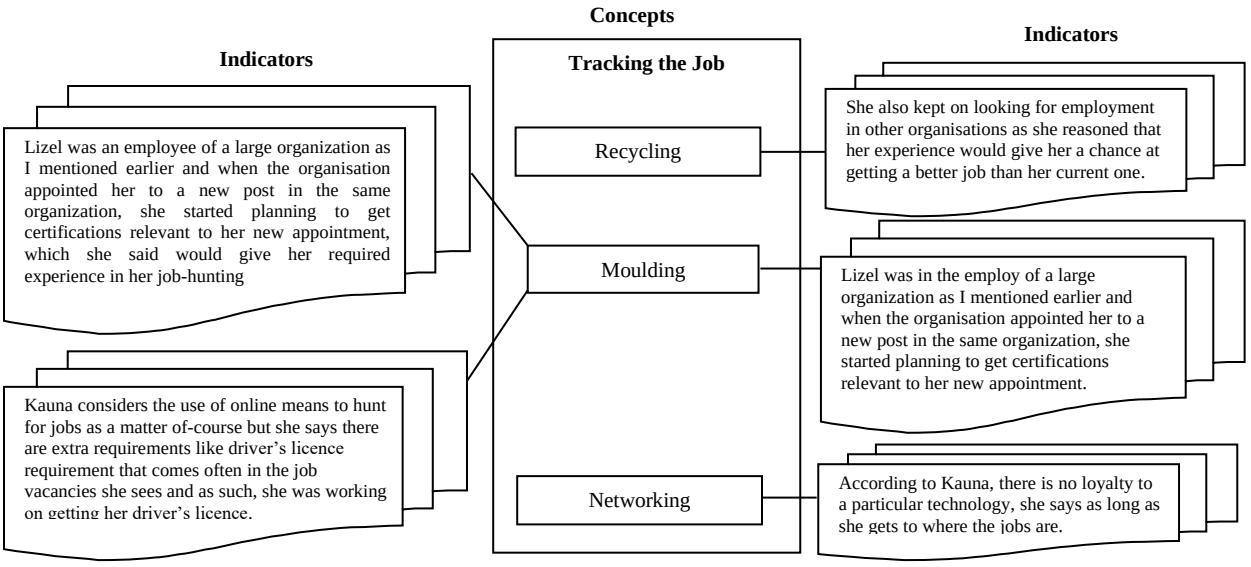


Figure 14: Derivation of Tracking the Job

4.4.2.3 Tracking the job provider

Jobseekers preferred to work for certain organizations (job providers) more than others. Shivute preferred to work for an organization with people capable and willing to train him, because he needed skills and experience to put him in good standing in job-hunting (*networking* - *tracking the job provider*). Kazembiri noted that she could not change the nature of an organization but she could adapt to an organisation's needs (*moulding* - *tracking the job provider*). On the same note, Mandume said he had role models in different organisations and if an organization had one of his role models then he would consider working for that organisation (*networking* - *tracking the job provider*). Instead of role models, some organizations were preferable than others because they had good reputations and Penehafo preferred working for telecommunication organizations to other organizations (*moulding* - *tracking the job provider*). Chris allowed recruitment agencies to choose where to submit his applications for employment as long as his profile met the requirements for the job advertised (*delegating* - *tracking the job provider*). Other jobseekers, mostly employed, would target a set of employers in a particular industry and keep submitting applications whenever those employers advertised a job vacancy (*recycling* - *tracking the job provider*). Figure 15 shows the emergence of *tracking the job provider*.

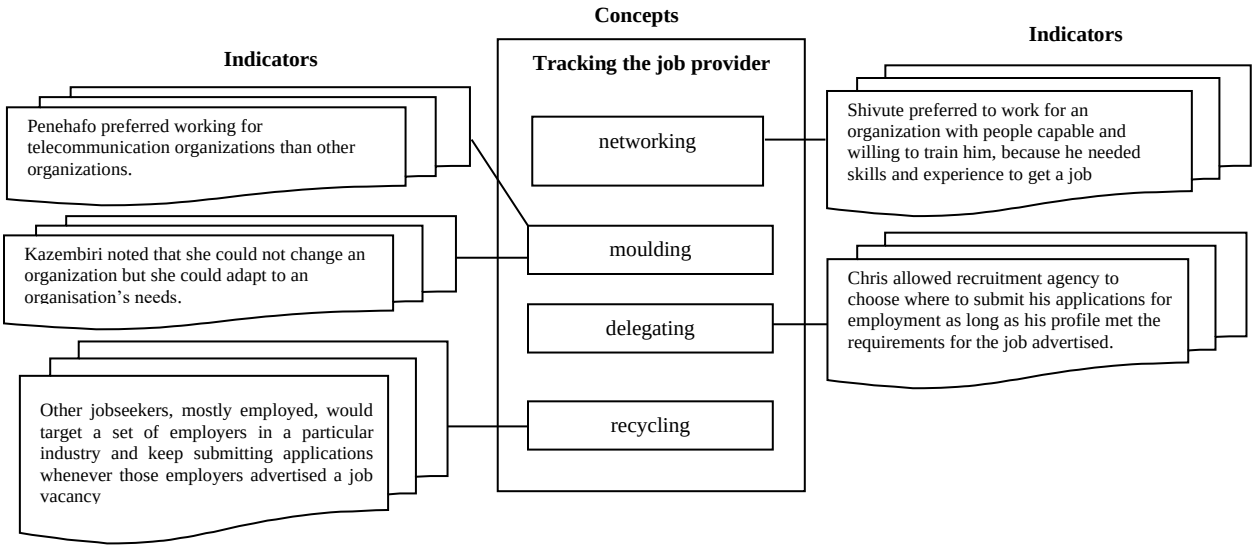


Figure 15: Derivation of Tracking the Job Provider

4.4.2.4 Tracking the jobseeker

Jobseekers observed trending attributes of successful jobseekers. They observed that jobseekers who continuously improve their qualifications are likely to succeed (*moulding* - *acquiring knowledge*). However, Shivute said knowledge attained in class and skills associated with practical subjects do not compare to what he would get from working in the environment of employment (*moulding* - *acquiring skills*). Kazembiri added that she needed to adapt to the organization if she was to be suitable for a post in an organisation (*moulding* - *adapting to nature of organisation*). Chris, Kapenda, and others indicated that having job experience improved one's chances of recruitment (*moulding* - *acquiring experience*) because employers wanted people with experience to fill their job vacancies. Derivation of *tracking the jobseeker* is summarised in the schematic diagram in Figure 16.

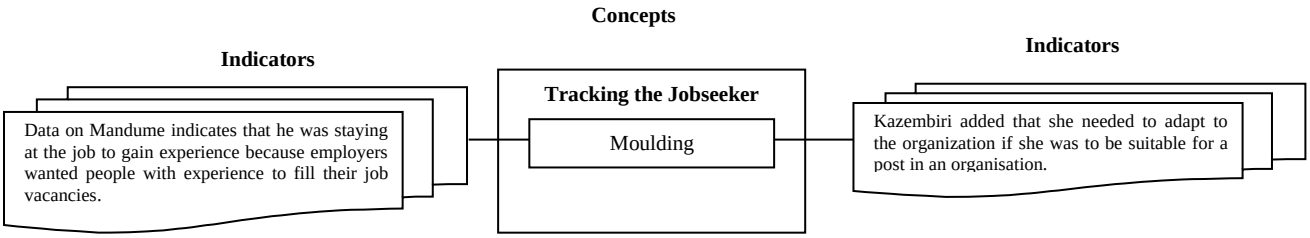


Figure 16: Derivation of Tracking the Jobseeker

4.5 Derivation of Positioning for Fit

Positioning for fit captures how jobseekers occupied vantage space for the purposes of resolving theor main concern (fit or lack thereof). *Positioning for fit* is a process by which jobseekers established themselves at a position (cyber position, physical position or psychological position). *Cyber position, physical position and psychological position* are online space, physical/tangible space/place, and a mental space respectively, which one can occupy.

Positioning for fit has three subcategories, namely *seeking a position*, *registering a position* and *affirming a position* (Figure 17).

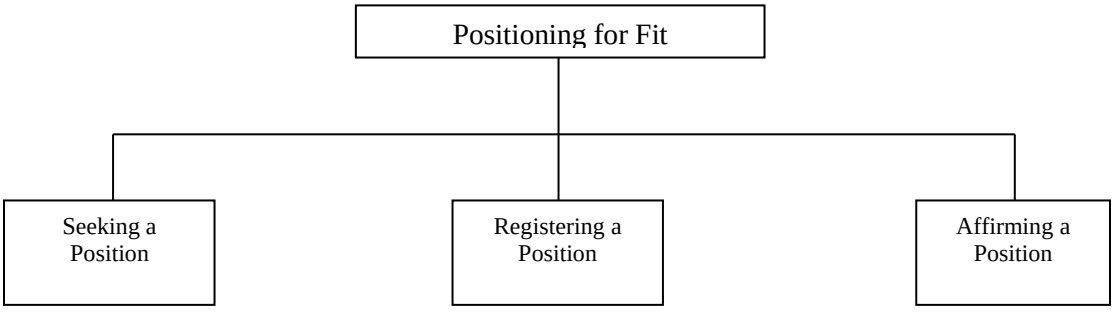


Figure 17: Subcategories of Positioning for Fit - Jobseekers

As in the previous section on the emergence of *interpreting fit*, this section starts with the open codes and moves on to the high abstraction categories namely *seeking a position*, *registering a position* and *affirming a position*, which constitute *positioning for fit*.

In the following subsections, I explain the categories, namely *seeking a position, registering a position* and *affirming a position*. As in section 4.4, I will distinguish labels of open codes associated with each indicator in the data by underlining them and giving a short description of the corresponding indicator soon after the label of the open code (e.g. *label of open code* – *description of indicator*).

4.5.1 Seeking a Position

Derivation of *seeking a position* is done indirectly, through derivation of *waving the placard* and *requesting a position*, which are its subcategories. Once the subcategories are derived, their super-category is derived. This section provides details on the derivation of *waving the placard* and *requesting a position*, which are subcategories of *seeking a position*.

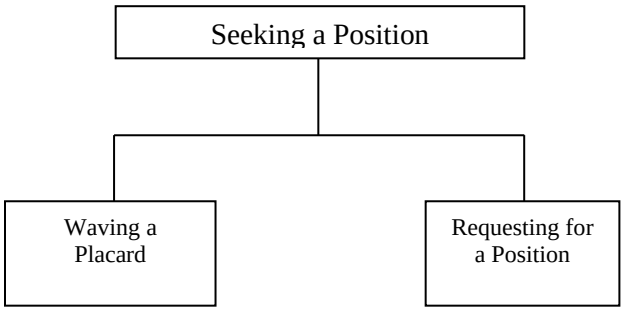


Figure 18: Subcategories of Seeking a Position - Jobseekers

4.5.1.1 Waving a Placard

Waving a placard is a signalling process used by jobseekers to look for positions (physical, cyber or psychological). *Waving a placard* initiates the search for a position. The label is a result of observing how jobseekers in Namibia stand by roadsides and vicinities of hardware shops waving placards with the jobseekers' skill-set written on them in an attempt to attract passers-by who may have wanted to recruit (*seeking attention* – *seeking psychological position*). At times, jobseekers wave the tools of their trade e.g. paint brushes, joinery tools and so forth (*seeking attention* – *seeking psychological position*). The same concept is adopted online by jobseekers, when they register on job providers' websites and professional websites - they present their skills, experience and other relevant details (*seeking attention* – *seeking*

psychological position) (see Figure 19). Figure 19 is an extract from www.linkedIn.com indicating that information technology helps jobseekers find positions in a network when automated messages requesting connection are send to other network users (*seeking connection* – *waving a placard*). Kapenda, Lizel and other jobseekers placed unsolicited job applications (*seeking attention* – *seeking psychological position*). Once attention was granted to the jobseeker, connection usually followed.

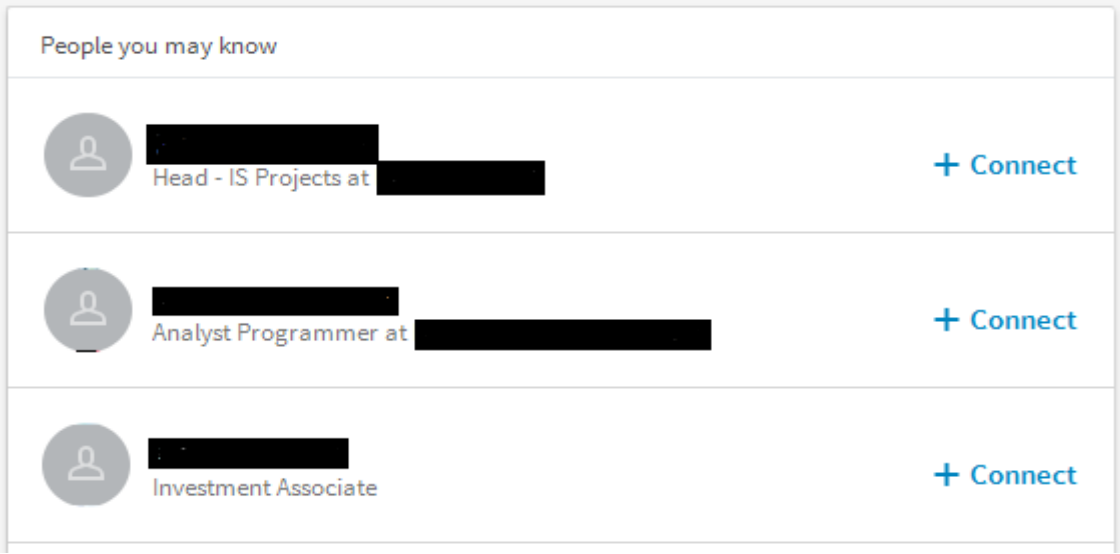


Figure 19: Seeking a Position on a Network

Data on Kapenda and other jobseekers indicates that jobseekers at times initiated requests for meetings with recruitment agencies (*seeking attention* – *seeking psychological position*). In those meetings, the jobseeker engaged the job provider (*seeking connection* – *waving a placard*).

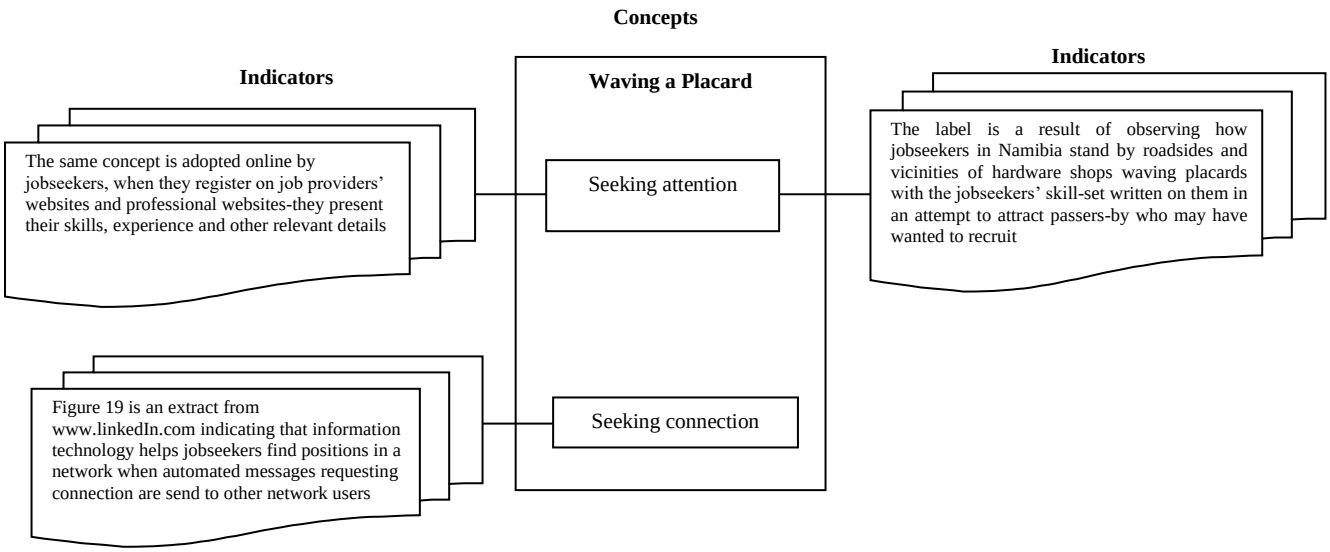


Figure 20: Derivation of Requesting for a Position (Jobseekers)

Mentioning current position is a manifestation of suitability for a similar position in the same or other organization. Thus, such mentioning or *waving the placard*, can be interpreted as seeking a position (see Figure 20).

4.5.1.2 Requesting for a Position

Jobseekers request seen and/or advertised positions (*responding to availed position* – *requesting for a position*) as Penehafo and Kapenda related in stories of their job seeking experiences. Ndilinawa, Namupala and Hailonga applied only for advertised positions at the time this researcher collected data (*responding to availed position* – *requesting for a position*). Figure 21 shows the derivation of *requesting for a position.*

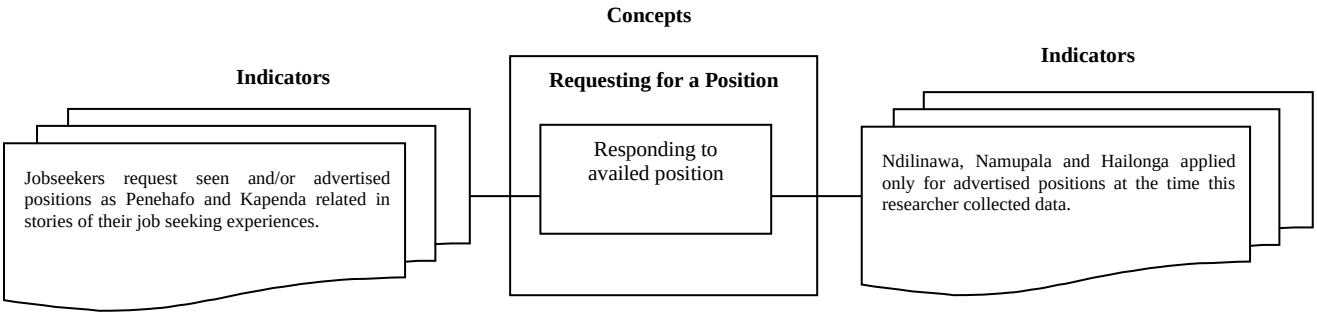


Figure 21: Derivation of Requesting for a Position (Jobseekers)

4.5.2 Registering a Position

Registering a position is the process of taking occupancy of a position, which serves as proclamation of occupancy of the position by the jobseeker. The gerund used, that is, 'registering' comes from the process that jobseekers go through to attain a position online. The data revealed that *registering a position* carries the assumption that people define a position relative to other entities. *Registering a position* has three subcategories, namely *registering a cyber-position*, *registering a physical position* and *registering a psychological position*.

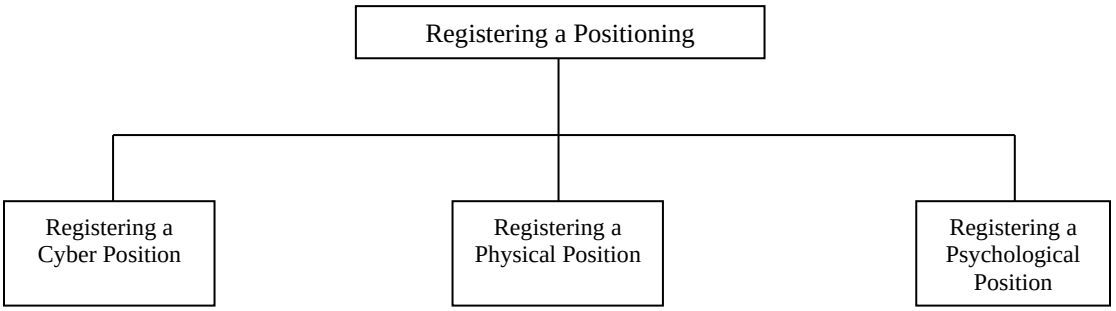


Figure 22: Subcategories of Registering a Position (Jobseekers)

4.5.2.1 Registering a Cyber - Position

Kapenda, as related in the previous section moved to Otjiwarongo to improve her networking, as there was better access to mobile networks and newspapers in Otjiwarongo. However, it was not enough to be in Otjiwarongo, as she had to have presence on the mobile network platforms and the Internet, which she did by registering at least one account on www.whatsapp.com, on www.facebook.com (*registering on*

social networks - *registering a cyber-position*) and on www.linkedIn.com (*registering on professional network* - *registering a cyber-position*) among other online presences. Shilongo indicated that the online registration processes conducted on employee recruitment websites (*registering on job provider websites* - *registering a cyber-position*) was too long for her liking.

Jobseekers who preferred online job seeking supplied their personal details on professional websites like www.linkedIn.com (*registering on professional network* - *registering a cyber-position*). Jobseekers e.g. Mandume, Quinton, Saara and Kandombo had accounts on www.linkedIn.com (*registering on professional network* - *registering a cyber-position*) and profiles accompanying the accounts contained declarations of items of identity such as employment status and current job post held. All participant jobseekers in this research owned (or had access to) mobile phones connected to mobile communication networks, (*registering on mobile network* - *registering a cyber-position*) which they used for communication and accessing the Internet. Figure 23 shows the derivation of *registering a cyber-position*.

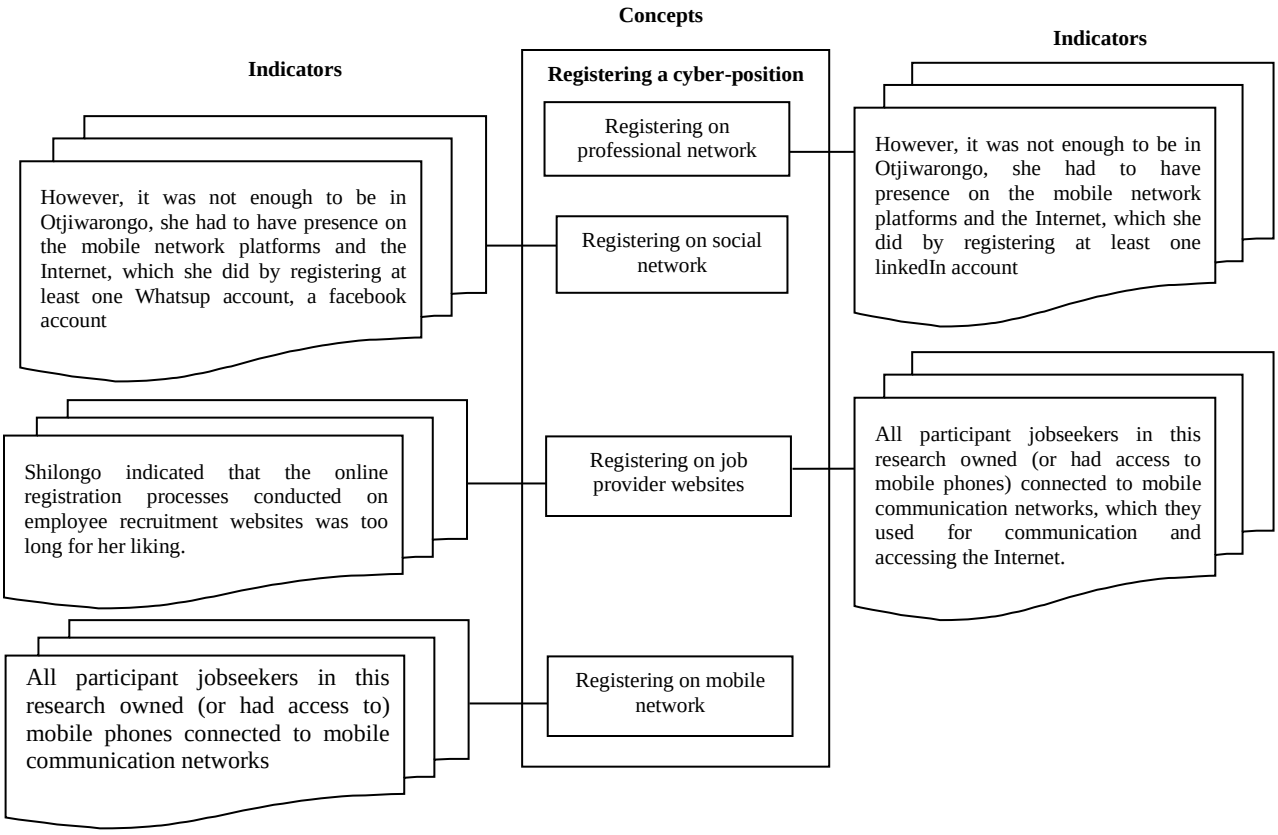


Figure 23: Derivation of Registering a Cyber-Position

4.5.2.2 Registering a Physical Position

Registering a physical position is a process of being physically present and giving first signal of presence after absence from the geographic physical position. Many jobseekers (Kauna, Kandombo, Josephine, Penehafo, Shilongo, Amukwaya, Peneyambeko and Hafeni) in this research originated from places out of the capital city - Windhoek but relocated to Windhoek to look for opportunities and jobs (*relocating* - *registering a physical position*). Kapenda moved to Otjiwarongo (*relocating* - *registering a physical position*) to improve her networking as Otjiwarongo is less than three hundred kilometres from Windhoek. Kapenda made frequent visits to Windhoek for recruitment purposes (*visiting a place* - *registering a physical position*). She said the right place to be was Windhoek but she could not afford to stay in Windhoek because of the associated expenses. In Windhoek, jobseekers also visited job providers

nearest to them (*visiting a place* - *registering a physical position*) in search of employment. Figure 24 is a schematic representation of the derivation of *registering a physical position.*

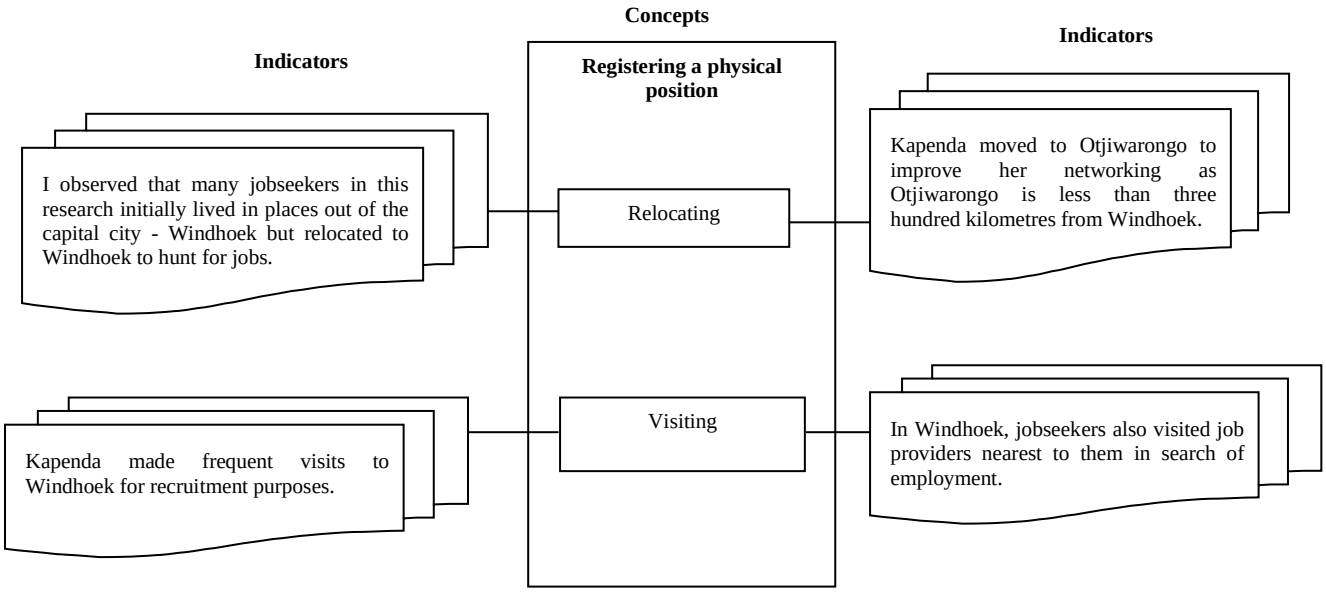


Figure 24: Derivation of Registering a Physical Position

4.5.2.3 Registering a Psychological Position

Registering a psychological position involves a human entity making a mental note of something. Josephine said she visits job providers in person because she thought a physical meeting stays in the mind much longer than a cyber-meeting alone (*non-cyber communication with job providers* - *registering a psychological position*). She also emailed her curriculum vitae to two banks so that they keep the curriculum vitae for review in the event of a vacancy arising (*cyber-communication with job providers* - *registering a psychological position*). Both cases require some human entity noting the stored recruitment details. Every jobseeker formulated his/her mental self-image in the recruitment sphere (*non-cyber communication with jobseeker* - *registering a psychological position*). Jobseekers staying outside Windhoek wanted to see vacancies advertised in newspapers so they asked friends and relatives who stayed in Windhoek to email, www.whatsapp.com or www.facebook.com vacancies those to them (*non-*

cyber communication with jobseeker, *cyber-communication with job providers* - *registering a psychological position*). Figure 25 captures the derivation of *registering a psychological position*.

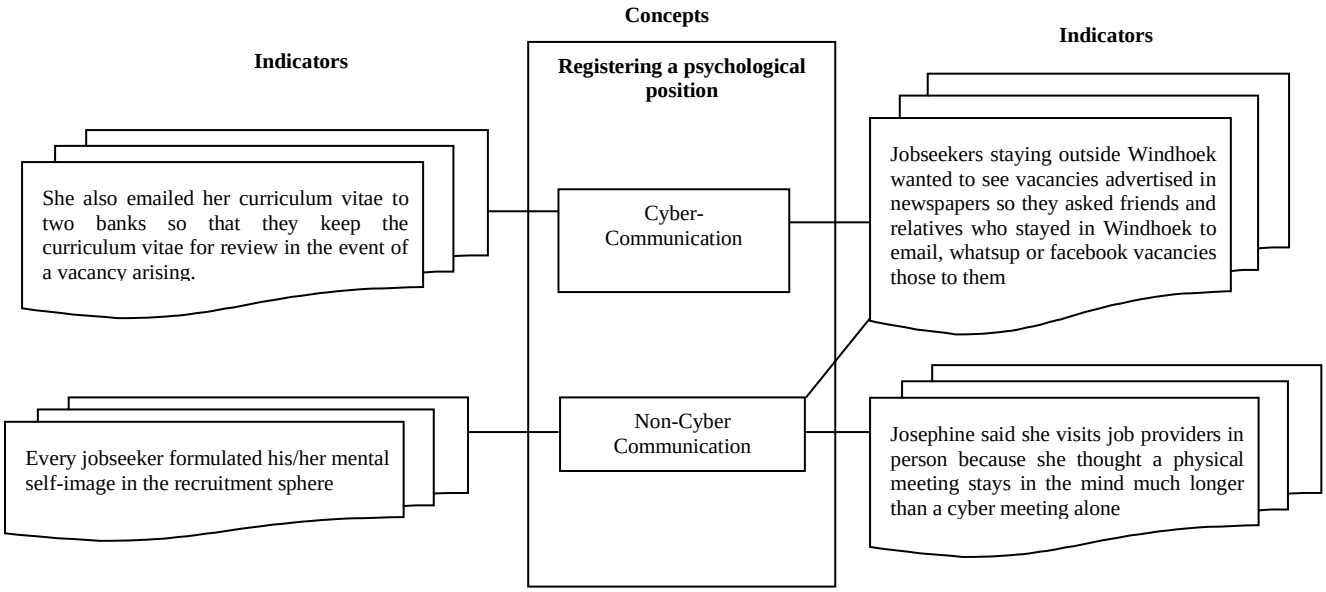


Figure 25: Derivation of Registering a Psychological Position

4.5.3 Affirming a Position

Affirming a position is a category, which captures how jobseekers maintain positions after attaining them. *Waving a placard* and *networking* are the subcategories of *affirming a position* (see Figure 26).

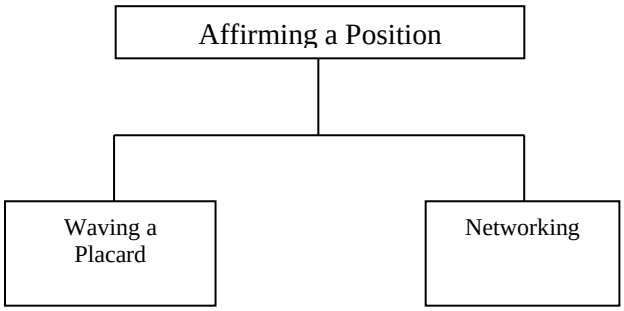


Figure 26: Subcategories of Affirming a Position (Jobseekers)

4.5.3.1 Waving a Placard

Unlike under *seeking a position*, *waving a placard* under *affirming a position* serves to establish continued presence in a position. Mandume used email or telephone to follow up on some of the applications for job positions he made (*signalling unchanged position* – *waving a placard*). Professional websites like www.linkedIn.com broadcast notifications and updates on account owners' activities to connected accounts (*notifying and updating* – *waving a placard*) (see Figure 27).

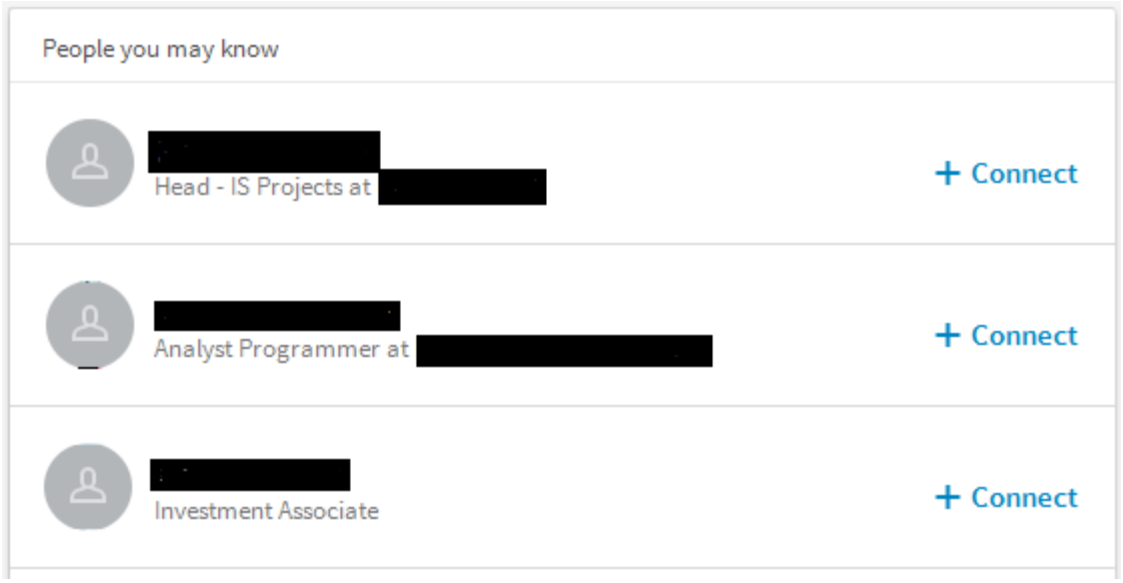


Figure 27: Reminding of Psychological Position

Figure 27 shows that the persons suggested hold positions of Head – IS Projects, Analyst Programmer and Investment Associate (*notifying and updating* – *waving a placard*), while Figure 28 shows the derivation of *waving the placard*.

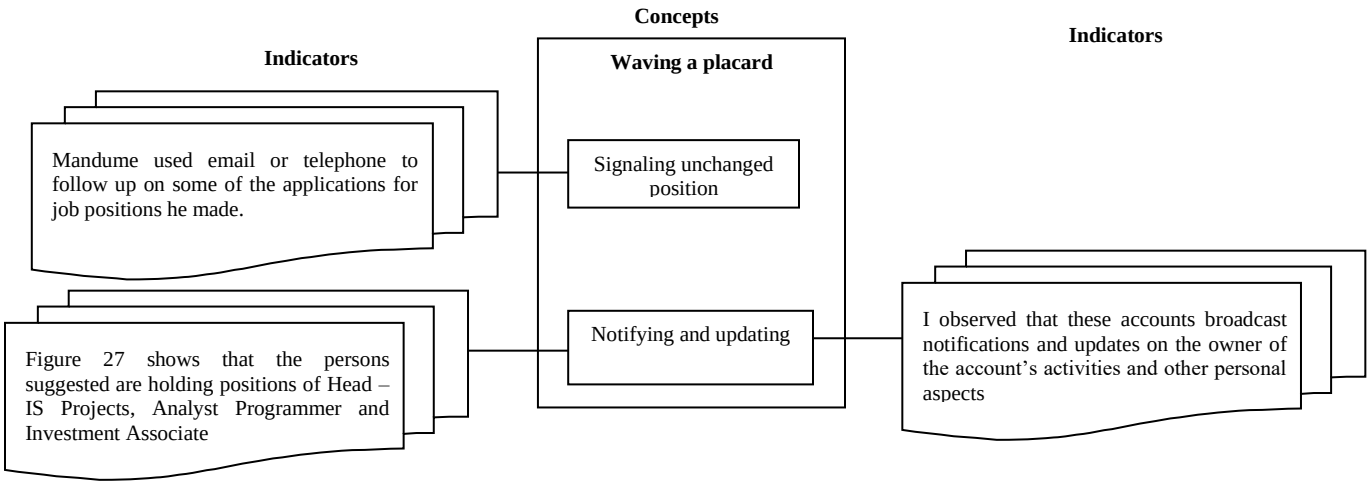


Figure 28: Derivation of Waving the Placard

4.5.3.2 Networking

The profiles connected to a jobseeker affirm one's position in job seeking. Jobseekers connected to recruitment stakeholders and professionals through accounts on www.linkedIn.com (*connecting - networking*). Professional websites like www.linkedIn.com broadcast notifications and updates on www.linkedin.com account owner's activities and other aspects to accounts of fellow www.linkedin.com subscribers e.g. job anniversaries, job changes etc. (*communicating – networking*). I also personally received requests for connection to my network from research participants (*requesting connection – networking*) as shown in Figure 29.

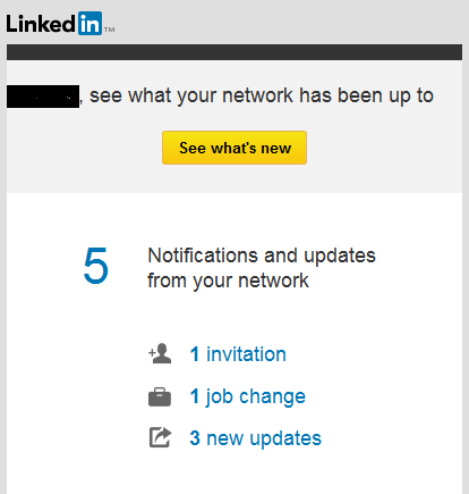


Figure 29: Example of Affirming a Position

Figure 30 is a diagrammatic representation of the derivation of *networking* by jobseekers.

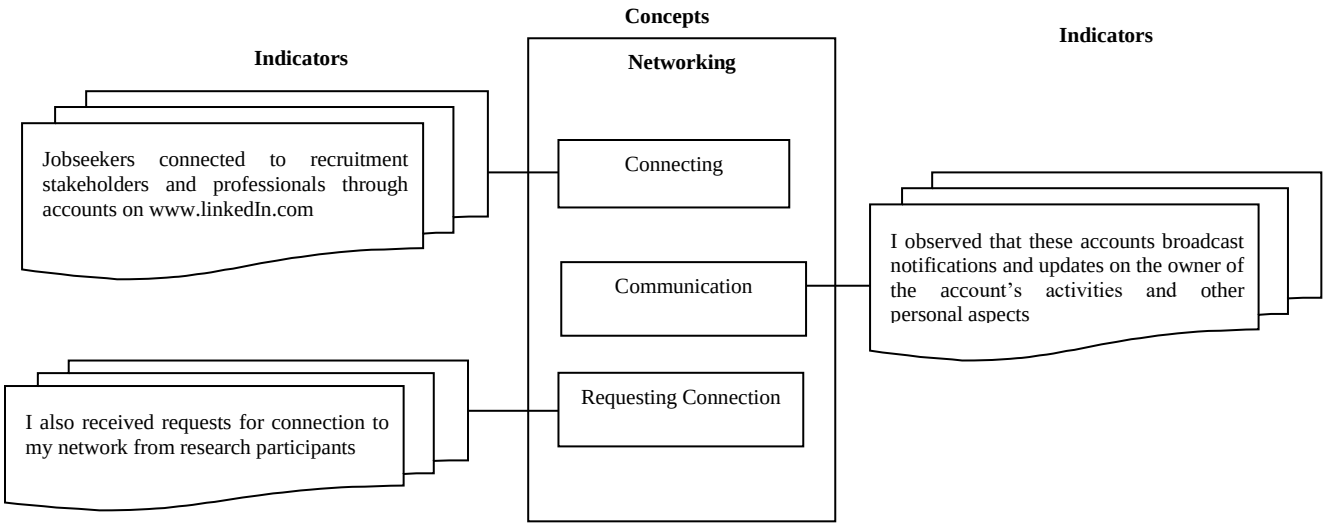


Figure 30: Derivation of Affirming a Position

4.6 The Purpose of Jobseekers' Behaviour (Pursuing Fit)

I concluded that the purpose served by *interpreting fit* and *positioning for fit* was to achieve fit between the different *objects of concern*. The process of achieving fit is what I called *pursuing fit* in this study. A detailed discussion of *pursuing fit* is in Chapter 6 and Chapter 7.

4.7 Summary of the Chapter

After this chapter's introduction, a description of the participant jobseekers in the research followed. It then presented the *objects of concern* for jobseekers, emergence of categories from data related to the jobseekers and e-recruitment. The chapter showed the derivation of *interpreting fit* and *positioning for fit*. The chapter also gives *pursuing fit* as core category in e-recruitment from the perspective of the jobseekers and recruitment agencies. The next chapter applies the same GTM approach as in this chapter with respect to recruitment agencies.

CHAPTER 5: FINDINGS ON RECRUITMENT AGENCIES DATA

5.1 Introduction

This chapter is similar to the previous chapter in structure. However, the analysis in this chapter was done after selective codes had emerged from the analysis in Chapter 4. I analysed the recruitment agencies data at hand and from the broad range of codes that emerged, noticed and selected codes that closely related with or were the same as codes in Chapter 4. The chapter gives profiles of recruitment agencies without compromising their privacy and confidentiality. Since *objects of concern* were defined in Chapter 4, this chapter states the *objects of concern* for recruitment agencies. As stated in Chapter 4, these *objects of concern* emerged during the derivation of *interpreting fit*, which in this chapter takes place in Section 5.4. Details on the derivation of *interpreting fit* are included in Appendix I. (i) and those for derivation of *positioning for fit* are in Appendix I. (ii). The chapter closes with a summary.

5.2 Recruitment Agencies

I collected and analysed data from three recruitment agencies to which pseudonyms Posh, DevSite and TalentScout were given. I interviewed employees of the recruitment agencies in the period 29 July 2015 to 11 August 2015. I also consulted other sources of data (e.g. websites, social media platforms, etc.). Jobseekers also provided information on recruitment agencies, and I observed recruitment agencies to acquire more data. Paragraphs below describe Posh, DevSite and TalentScout; Posh and TalentScout had physical offices in Windhoek while the physical location of DevSite was not apparent from its online presence.

Posh mainly focussed on helping jobseekers new on the job market. It had at least four dedicated staff members whose tasks included liaising with both employers and job seekers. The agency ran a website and was visible on other online platforms e.g. www.facebook.com, www.linkedIn.com and www.twitter.com. However, information on some of these platforms was outdated, in some cases by more

than a year. I collected data on Posh by observation, interviewing jobseekers and a Posh staff member named Loini (pseudonym) and an intern named Judith (pseudonym).

Jobseekers interviewed in this study mentioned DevSite many times. DevSite had a vibrant website but there was no physical location for the agency. Regardless, jobseekers provided information I was able to use in the research. In addition, I collected data on DevSite's website and from jobseekers who had experience with DevSite.

TalentScout had visibility online and jobseekers of various technical literacy levels made use of it. Its emphasis was on satisfying its clients (employing organizations) by providing them with the most suitable candidate for their vacancies. Aside from the data provided by jobseekers on TalentScout I had an interview with Sheron (pseudonym), a recruitment officer in the agency.

5.3 Objects of Concern for Recruitment Agencies

Recruitment agencies, like jobseekers, had a number of *objects of concern* about e-recruitment, namely *information technology*, *job*, *client*, *candidate* and *recruitment agency* (themselves).

5.4 Derivation of Interpreting Fit

Interpreting fit is a category that captures how recruitment agencies interpret the semantics of concepts. A fitting semantic representation is one that all or at least the majority of the stakeholders of the concept espouse. Analysis of data associated with recruitment agencies indicated *interpreting fit* through emergent open codes. *Interpreting fit* entails that recruitment agencies need to interpret the *information technology* of employee recruitment, interpret the *candidate*, interpret the *job*, interpret the *client* offering the job and interpret the *recruitment agency* (themselves).

The following sub-sections explain the process of derivation of *interpreting fit*. The derivation starts with derivation of open codes from data. Open codes are then categorised to form subcategories of *interpreting fit* (see Appendix I). Interpreting fit and its constituent subcategories are shown in Figure 31.

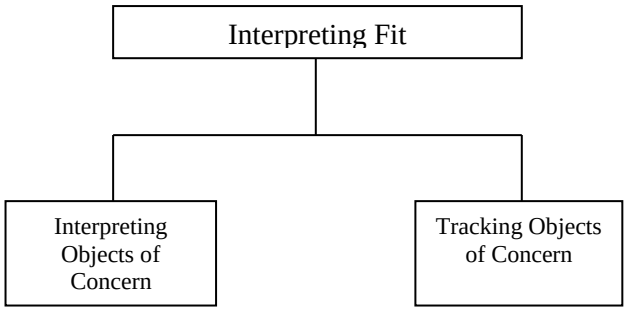


Figure 31: Subcategories of Interpreting Fit - Recruitment Agencies

The subcategories of *interpreting fit*, namely *interpreting objects of concern* and *tracking objects of concern* have their own subcategories (Appendix I), which were derived from classifying open codes as detailed in the coming sections. In the derivation process, when data provided an indicator to an open code, I wrote down the label for the open code and underlined it, additionally I wrote down a short description of the indicator (e.g. *label of open code* – *description of indicator*) (see sections below).

5.4.1 Interpreting Objects of Concern

This category captures the way recruitment agencies evaluated concepts in recruitment. As in the case of jobseekers, *interpreting objects of concern* has subcategories based on what recruitment agencies are interpreting, these categories are; *interpreting the information technology*, *interpreting the job*, *interpreting the client*, *interpreting the candidate* and *interpreting self* (see Figure 32).

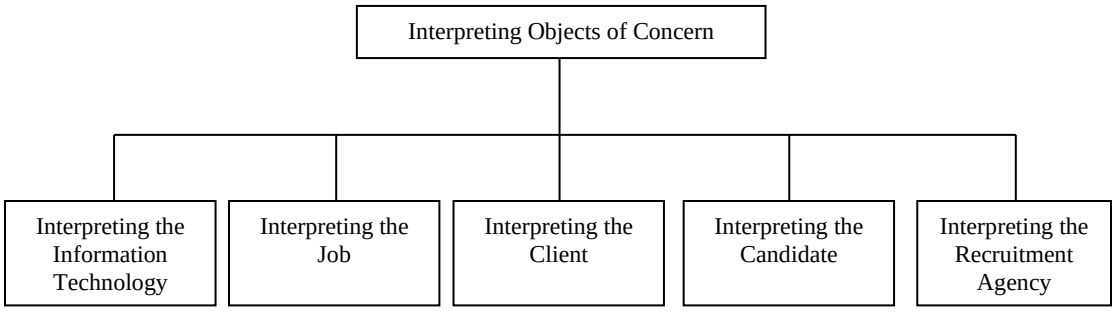


Figure 32: Subcategories of Interpreting Objects of concern (Recruitment Agencies)

5.4.1.1 Interpreting the Information technology

Recruitment agencies in this research viewed electronic information technology of recruitment as time and labour efficient (*information technology is efficient – positive interpretation*). Loini, an officer at Posh, told of how electronic information technology allowed Posh to receive and file many curriculum vitae received from jobseekers and documents received from client organizations (*information technology is convenient – positive interpretation*). Looking at Posh's www.facebook.com account, I observed that it used the account to post available job positions, advertise future training workshops for candidates and provide information on job-hunting in general (*information technology is efficient – positive interpretation*).

TalentScout viewed its website as a meeting place for jobseekers (candidates), employing organizations (clients), specialists in job and candidate assessment and itself (*information technology is convenient – positive interpretation*). Thus, the website had web pages for candidates, clients, candidate and job assessment, and web pages about TalentScout (*describing information technology – neutral interpretation*). The website was an interface for communication between TalentScout and its stakeholders through blogging and emailing (*describing information technology – neutral interpretation*). Registration on the website by candidates and clients enabled the recruitment agency to build a network that included jobseekers and clients (*information technology is convenient – positive interpretation*). At the time of the research, TalentScout had not linked its website to any social networking site; however, they had an active www.facebook.com account on which they posted job vacancies, and allowed other www.facebook.com account holders to share information with them and with each other (*information technology is convenient – positive interpretation*).

DevSite operated a website on which it posted jobs from other recruitment websites (*information technology is convenient – positive interpretation*). It viewed its website as a way of collaborating with other recruitment agencies and recruiters by helping in publicising available job positions (*information*

technology is convenient – *positive interpretation*). DevSite offered free advertising of vacancies for anyone on their website. Similar to TalentScout, DevSite's website had web pages for recruiters, jobseekers and space for other commercial advertisements (*describing information technology* – *neutral interpretation*). DevSite's www.facebook.com account supported its website by redirecting Internet users from its www.facebook.com account to the DevSite website (*information technology is convenient* – *positive interpretation*). Figure 33 and Figure 34 are examples of how DevSite used its www.facebook.com account to redirect users.

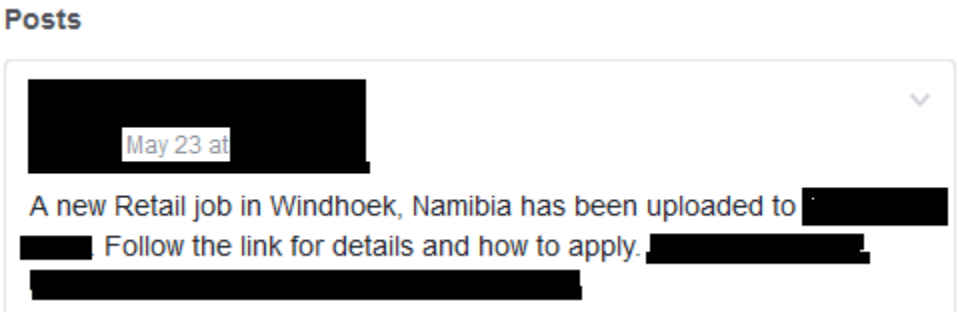


Figure 33: Redirecting Users (DevSite on www.facebook.com)

Figure 34: Redirecting Users (DevSite on www.facebook.com)

DevSite used its www.twitter.com account to redirect Internet users to DevSite's website as shown in Figure 35 (*information technology is convenient* – *positive interpretation*). After giving the title of the job, DevSite put the link (uniform resource identifier (URI)) to its website (*information technology is convenient* – *positive interpretation*).

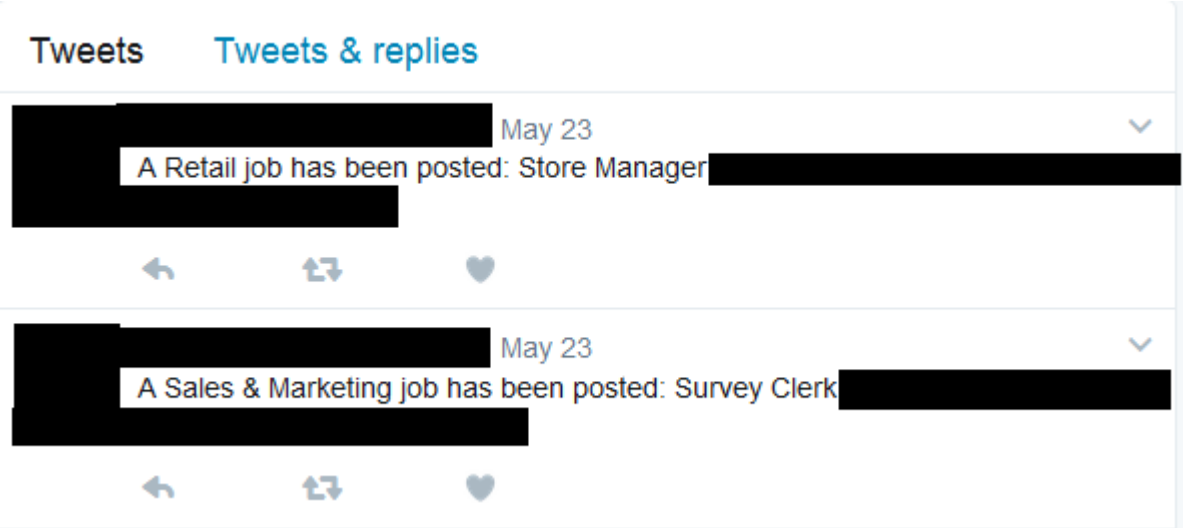


Figure 35: Redirecting Users (DevSite on www.twitter.com)

DevSite also redirected users from its www.linkedIn.com account to its website, which increased traffic to its website, over which it had more control than the control it had over social media platforms (*information technology is convenient* – *positive interpretation*).

DevSite, like other recruitment agencies, did not emphasise redirection from its website to social media platforms (*avoiding inconvenience of information technology* – *negative interpretation*). The minute link icons on its website as shown in Figure 36 indicate this lack of emphasis on redirection from DevSite's website to social networking websites (*avoiding inconvenience of information technology* – *negative interpretation*).

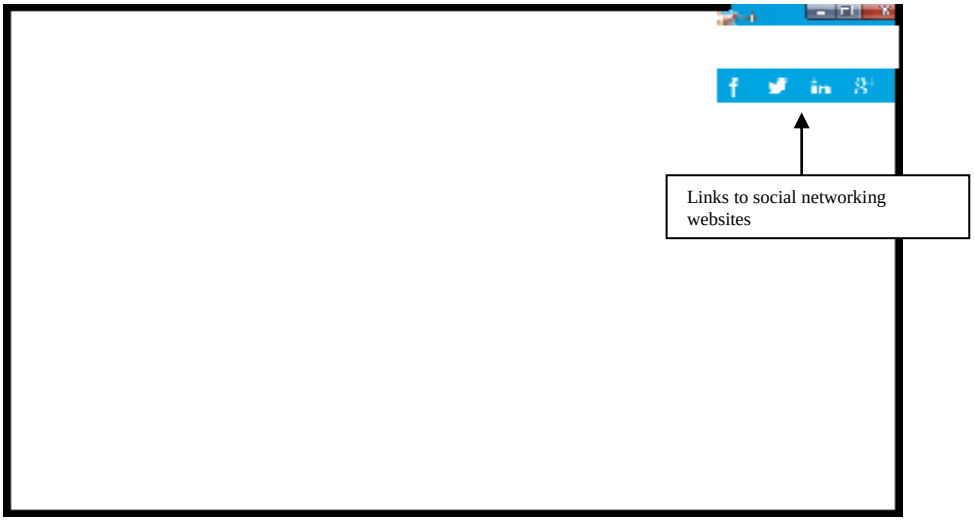


Figure 36: Diminutive Links to Social Networking Websites

Loini from Posh lamented the lack of effectiveness of their website and wondered why jobseekers were not keen on using their website (*information technology is ineffective* – *negative interpretation*). In comparison, Loini said stakeholders of Posh used its social networking accounts like www.facebook.com more than its website (*information technology is preferable* – *neutral interpretation*). On Posh's www.facebook.com account, job advertisements and other information appear in full with a few redirections of users to other websites (*information technology is sufficient* – *positive interpretation*). Figure 37 gives a snippet from Posh's www.facebook.com account.

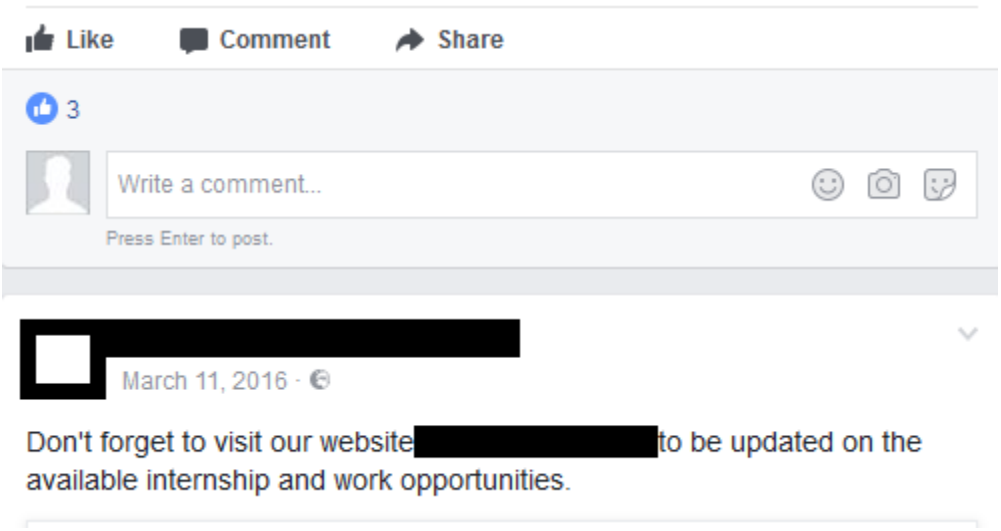


Figure 37: Redirection to Posh's Website

I observed that sometimes recruitment agencies e.g. Posh, provided scanty details of job vacancies on social media platforms accompanied by a link to the agency's website which would have details on the vacancy (*information technology gives freedom* – *positive interpretation*). Loini said jobseekers indicated that they got information about Posh via www.facebook.com or from friends and acquaintances (*information technology is a supporting tool* – *positive interpretation*). I checked the www.facebook.com account of Posh on 24 May 2017 and there were 514 likes by users of www.facebook.com as shown in the caption in Figure 38, which means since the account's creation in 2015 it had received at least 514 visits.

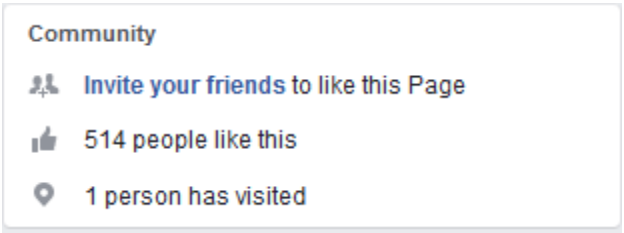


Figure 38: Number of Likes on Posh's www.facebook .com Page

Posh opened an account on www.twitter.com in March 2015, and on 25 May 2017, it had 40 tweets, 114 followers and it was following 125 twitter users. See caption in Figure 39.

Figure 39: Posh Twitter Numbers

Means of recruitment were traditional in many cases. TalentScout explicitly stated that it prefers meeting each of the jobseekers personally to have face-to-face conversations and have a better understanding of the jobseeker (*information technology is a supporting tool – positive interpretation*). At Posh, Loini emphasised the importance of meeting jobseekers and clients in person and to that end Posh arranged a number of workshops where jobseekers met employers to share experiences and expectations (*information technology is a supporting tool – positive interpretation*).

The newspaper was a means used by recruitment agencies to advertise vacant job positions and in many cases the advertisements would redirect the jobseekers to websites or to the physical locations of the recruitment agencies, (*information technology is a supporting tool – positive interpretation*). I did not witness any case of redirection from online information technology to a traditional source of information e.g. newspaper (*information technology is sufficient – positive interpretation*).

On confronting the data on information technology of recruitment, I realised that determination of efficacy of information technology is done before or after use of the information technology. The general perception by jobseekers and recruitment agencies in Namibia is that electronic information technology always results in efficient and effective execution of tasks (*information technology is efficient – positive interpretation*), however, evidence shows that recruitment agencies are selective of the activities on which they apply electronic information technology in recruitment (*information technology is a supporting tool – positive interpretation*).

Recruitment agencies viewed the use of information technology as a sign of modernity (*information technology is modernity – positive interpretation*). While recruitment agencies recognise the value of tried and tested traditional recruitment means, they observe the fading of some traditional recruitment activities like postal communication (*information technology is taking over recruitment activities (traditional means fading) – positive interpretation*). Figure 40 gives a portrayal of the emergence of *interpreting information technology*.

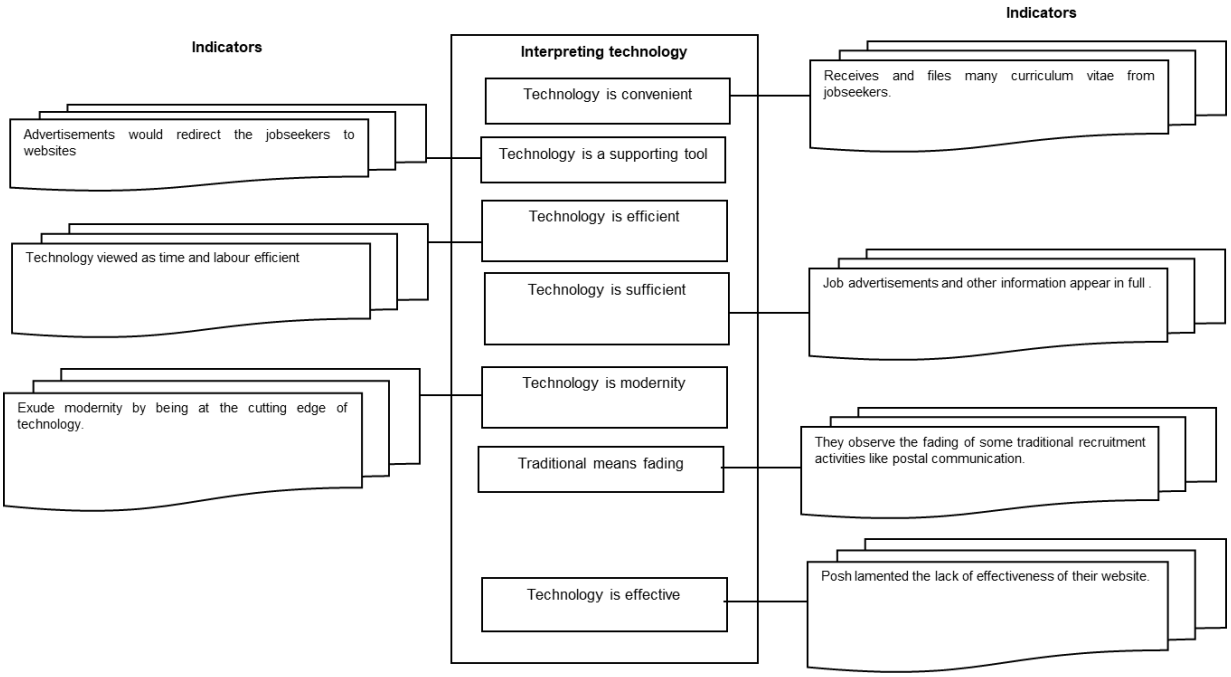


Figure 40: Derivation of Interpreting Information technology

5.4.1.2 Interpreting the Job

Interpreting the job by a recruitment agency contributed to the definition of a job profile. TalentScout indicated that its purpose was to understand the job the client had to offer and understanding the job (*understanding the job – neutral interpretation*) allowed the recruitment agency to formulate the profile of the ideal candidate (*representing the job – neutral interpretation*). According to information on TalentScout's website, contextual understanding of a job specification was of relevance in recruitment

(*contextualising the job* – *neutral interpretation*). Thus, TalentScout interpreted a job in the context of the recruiter's culture and needs.

Loini from Posh said that different titles were sometimes used for the same job in different organizations (*contextualising the job* – *neutral interpretation*). Much of what makes the job is the environment and the aspirations of those around the job (*contextualising the job* – *neutral interpretation*), she continued. I observed that TalentScout placed job adverts on their www.facebook.com but not much on their website and one www.facebook.com user's comment captures that preference in Figure 41, which is an extract from TalentScout's www.facebook.com account (*job fits social media advertising* – *neutral interpretation*).

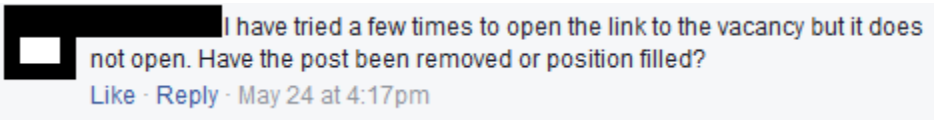


Figure 41: Vacancies Details not Available on Website

Evidently, whether TalentScout revealed vacancy details on the website or not, my inference was that the nature of the job title and the few details revealed on www.facebook.com were sufficient to redirect the candidate from www.facebook.com to TalentScout's website (*job is attractive* – *positive interpretation*). The recruitment agency interpreted the job to be capable of encouraging candidates and other visitors to their www.facebook.com page to visit their website (*job is attractive* – *positive interpretation*). *Interpreting the job* was a way of measuring the quality of the job and DevSite indicated on its website that it did basic quality checks on the jobs posted for advertisement on its website (*evaluating the job* – *neutral interpretation*). Figure 42 shows the derivation of *interpreting the job*.

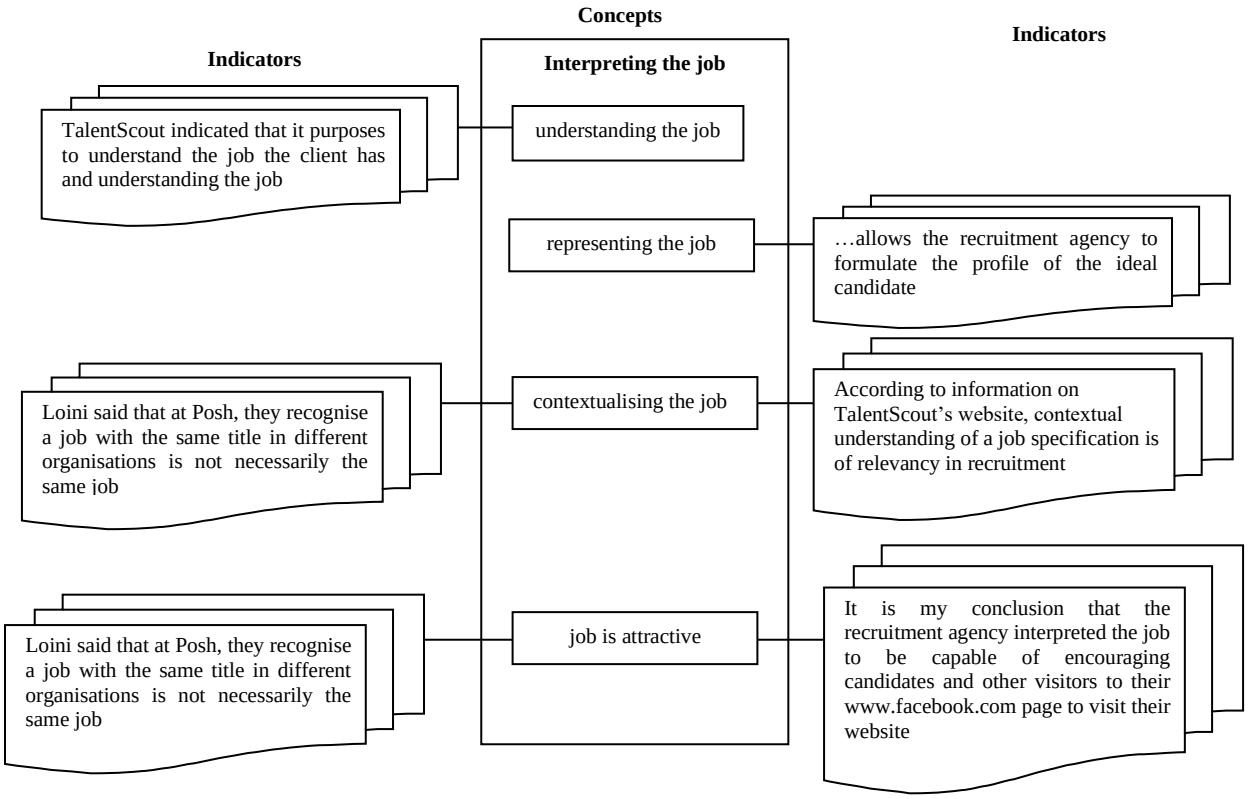


Figure 42: Derivation of Interpreting the Job (Recruitment Agencies)

5.4.1.3 Interpreting the Client

Recruitment agencies agreed that interpreting the job without knowledge of the client was insufficient for the purposes of recruitment (*understanding the client* – *neutral interpretation*). TalentScout had it on its website that it strived to understand the client to aid the recruitment process (*understanding the client* – *neutral interpretation*). TalentScout encouraged face-to-face meetings with clients and through such meetings understood the client (*understanding the client* – *neutral interpretation*). Clients funded TalentScout's business model, therefore interpreting the client allowed TalentScout to provide custom-made services to the client (*fitting the client* – *positive interpretation*).

DevSite, whose services were free had little pressure to interpret clients. Donations funded DevSite's operations and anyone was free to post a vacancy advert, including individual persons subject to DevSite's quality checks (*fitting the client* – *positive interpretation*). Job vacancy advertisements from

other recruitment agencies appeared on DevSite's www.facebook.com page with logos and other insignia of those recruitment agencies, meaning DevSite's clients included other recruitment agencies. DevSite helped in publicising the vacancies (*fitting the client – positive interpretation*).

Posh took every opportunity to publicise vacancies to its candidates. Posh organised workshops where candidates, Posh staff and Posh's industry partners met and in these workshops Posh could get a better understanding of their industry partners (*understanding the client – neutral interpretation*). Loini from Posh indicated that at times their organization understood some industry partners through publications in the newspapers or other news sites online (*understanding the client – neutral interpretation*). Figure 43 gives a succinct representation of the derivation of *interpreting the client*.

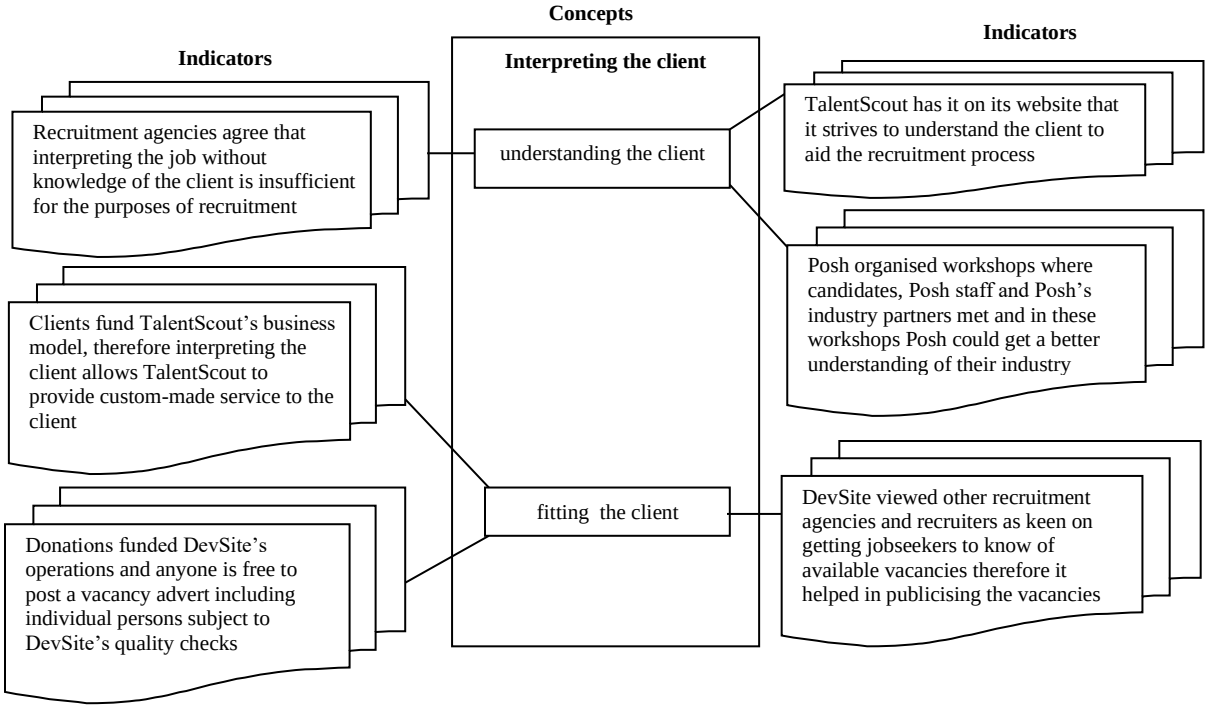


Figure 43: Derivation of Interpreting the Client

5.4.1.4 Interpreting the Candidate

TalentScout's website revealed that TalentScout interpreted candidates based on various information gathered on them. Candidates registered with TalentScout by providing curriculum vitae, certificates of identity, skills certificates and reference letters (*identifying the candidate – neutral interpretation*). TalentScout included face-to-face or telephonic interviews with candidates as part of the candidates' registration process (*identifying the candidate – neutral interpretation*). The interviews gave TalentScout an opportunity to get information about the candidate over and above what the candidate provided in the registration documents and curriculum vitae (*describing the candidate – neutral interpretation*). TalentScout described candidates based on information gathered on them and helped each candidate based on his/her description (*distinguishing candidates – neutral interpretation*). Aside from personalised help TalentScout provided to candidates, it also published on its website tips for candidates on how to prepare curriculum vitae, how to conduct oneself in an interview and other tips (*candidates have technical knowledge (to use Internet) – positive interpretation*).

TalentScout's www.facebook.com posts showed that it profiled candidates based on pre-determined personality types (*distinguishing candidates – neutral interpretation*). TalentScout at times involved specialist personality profiling organizations in interpreting candidates' personality types because it viewed personality types as indicators of the candidate's likelihood of success at certain types of jobs or organizations (*distinguishing candidates – neutral interpretation*).

According to information on its website, Posh kept a database of candidates' details gathered when the candidates registered with it (*describing candidates – neutral interpretation*). Posh interpreted the submitted details to understand candidates' personalities with the aim of submitting the details to a suitable employer (*matching candidates with clients – positive interpretation*). Interpretation of the candidates' details enabled Posh to identify areas where candidates needed help (*identifying candidates' needs – positive interpretation*). Posh, like TalentScout, emphasised meeting candidates in person as part

of the registration process and candidate interpretation process. Posh invited candidates for workshops on recruitment and in such workshops, Loini said, Posh took the opportunity to classify candidates by age, generation etc. (*distinguishing candidates* – *neutral interpretation*).

DevSite's registration process involved candidates entering personal details online and supplying an email address for DevSite to use during the validation of the candidate's registration (*identifying candidate* – *neutral interpretation*). Other information on candidates collected by DevSite included employment history, educational background and salary expectation (*describing candidates* – *neutral interpretation*), which according to DevSite's website, was collected for DevSite to have a better understanding of the candidate's needs and hence improve DevSite's service to the candidates (*distinguishing candidates* – *positive interpretation*). The website used cookies, which generated personalised interaction between the candidate and the website based on the candidate's personal details (*distinguishing candidates* – *positive interpretation*). Figure 44 captures the derivation of *interpreting the candidate*.

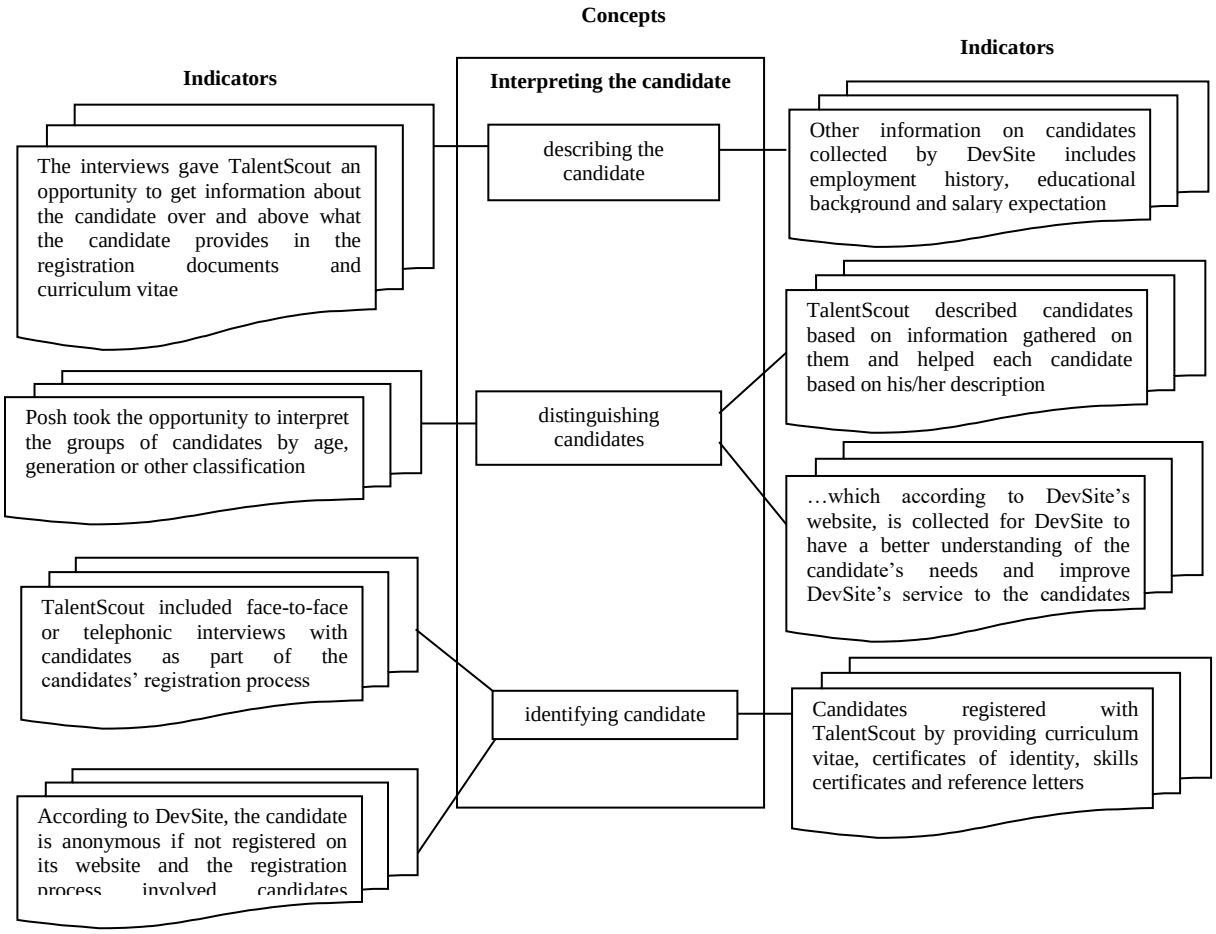


Figure 44: Derivation of Interpreting the Candidate

5.4.1.5 Interpreting Recruitment Agency

Statements on its website indicated that TalentScout viewed itself as the preferred recruitment agency in Namibia (*recruitment agency competing – positive interpretation*). It was convinced that it provided personalized services to facilitate the meeting of its clients and candidates (*recruitment agency facilitating recruitment – positive interpretation*). TalentScout also viewed its activities as targeted and improving interaction between employees and employers (*recruitment agency personalising recruitment – positive interpretation*). Contact details provided by TalentScout indicated that its stakeholders could use both electronic and traditional means to contact it (*recruitment agency provides choices – positive interpretation*). TalentScout considered itself an agency that gave a helping hand in matters of

development for both clients and candidates and to that effect, it availed to both several tips and online help on recruitment (*recruitment agency facilitating recruitment – positive interpretation*).

DevSite, based on its "About Us" web page, viewed itself as having the biggest recruitment website in Namibia (*recruitment agency competing – positive interpretation*), which had the capacity to allow jobseekers to get notifications of available jobs via email and enabled jobseekers to apply online (*recruitment agency competing – positive interpretation*).

Posh indicated that it was affiliated to a public sector organization and its goal was to facilitate the relationship between employers and jobseekers (*recruitment agency facilitating recruitment – positive interpretation*). Facilitation was part of helping new jobseekers prepare to be effective employees (*recruitment agency facilitating recruitment – positive interpretation*). Over and beyond recruitment Posh aimed to develop emerging jobseekers in line with international trends (*recruitment agency modernising – positive interpretation*). The international trends, Loini said, included using information technology as an aid in recruitment and she lamented how jobseekers were not using Posh's website. Although Posh emphasised use of information technology, (*recruitment agency modernising – positive interpretation*) it considered other sections in its parent organization as responsible for maintaining its website. Information technology provided stakeholders in recruitment access to Posh. Physical presence in the form of offices was available for stakeholders who preferred traditional ways of recruitment (*recruitment agency blending means – positive interpretation*). Figure 45 captures the derivation of *interpreting the recruitment agency*.

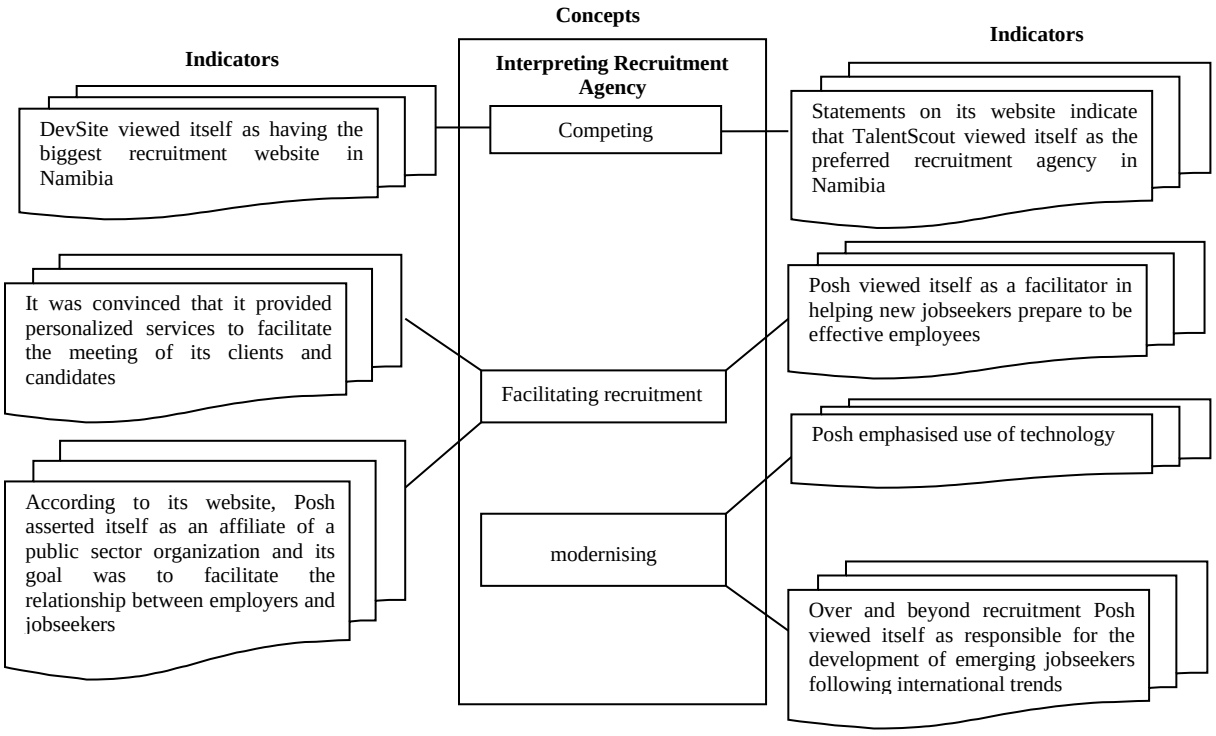


Figure 45: Interpreting Recruitment Agency

5.4.2 Tracking Objects of Concern

After *interpreting objects of concern*, namely the *information technology*, *job*, *client*, *candidate* and *recruitment agency*, recruitment agencies noted trends in the states and behaviours of the *objects of concern*. The category that captured the manifestation of trends is *tracking objects of concern,* which emerged with five subcategories, namely *tracking the information technology*, *tracking the job*, *tracking the client, tracking the candidate* and *tracking recruitment agency* (Figure 46).

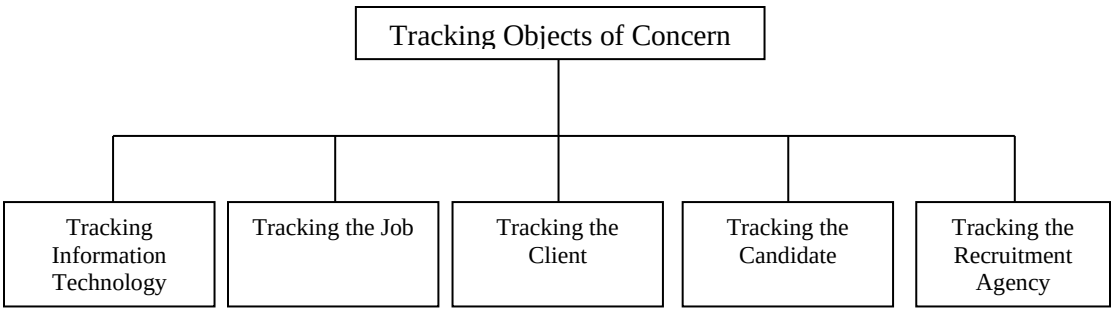


Figure 46: Subcategories of Tracking Objects of Concern (Recruitment Agencies)

Recruitment agencies noted trends in information technology which helped in job seeking (*tracking information technology*), trends in the jobs offered (*tracking the job*), trends in the providers of the jobs (*tracking the client*), trends in the behaviour and nature of candidates (*tracking the candidate*) and trends in their own states and behaviours (*tracking the recruitment agency*). The following subsections elaborate on derivation of the subcategories and hence the derivation of *tracking objects of concern*.

5.4.2.1 Tracking Information Technology

When TalentScout started it used traditional means in recruitment, but approximately half a decade after its creation, it noted the increased use of information technology (*shifting to technology – following trends*, *redirecting – following demand*). Information technology was also finding its way to the jobseekers, who started blending traditional means with information technology (*blending – blending information technology and tradition*). Although TalentScout noted the shift to information technology use, it also noted that traditional ways were still being used (*blending – blending information technology and tradition*).

Data from DevSite demonstrated the trend to towards social media like www.linkedIn.com, www.facebook.com and www.twitter.com (*shifting to social media (technology) – following trends*). Agencies were realising that increasingly mobile applications and gadgets were being used (*shifting to mobile technology – following trends*). Recruitment agencies indicated their intention to shift operations to online platforms, however they noted that traditional means were still valuable (*blending – blending*

information technology and tradition). Online presence needs support (*noting technology – following trends*), Posh noted, but according to Loini, the support was below the expected level.

After creating a www.twitter.com account and posting its first tweet Posh foresaw the future of its technology to be in the use of www.facebook.com (*exploring alternative technologies – opining one technology to be better than the other*). Figure 47 shows the derivation of *tracking information technology*.

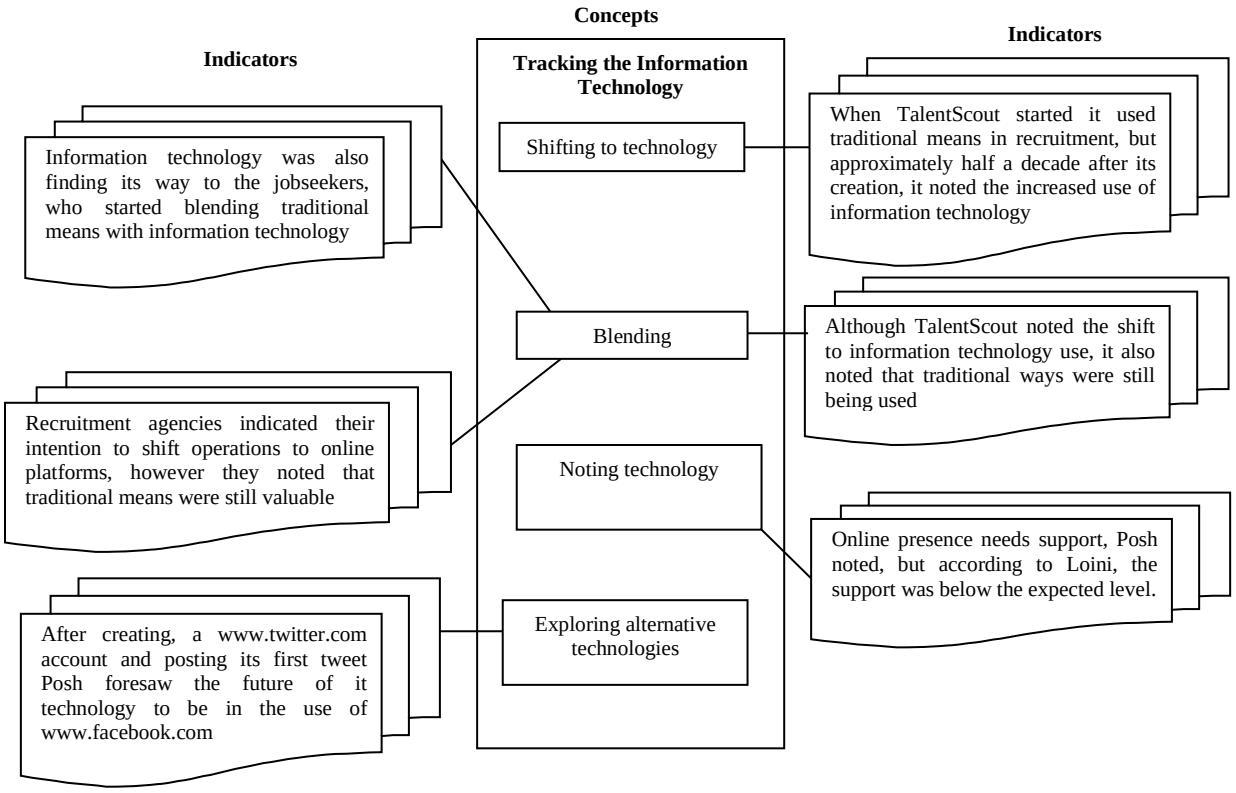


Figure 47: Derivation of Tracking Information Technology - Recruitment Agencies

5.4.2.2 Tracking the Job

Recruitment agencies followed and predicted trends in the job market, including trends in the evolution of jobs (*following and predicting job evolution – notice trends in job evolution*). They also followed and predicted patterns of job availability through the years (*following job availability patterns – which jobs become available at different times of the year*). Agencies followed patterns in changes to the

specifications of many job types in the job market (*following job evolution – which jobs become available at different times of the year*). Agencies also realised that constant communication with employers or clients gave them information on jobs to be availed in future (*networking – communicating with clients*). Recruitment agencies followed one client or another on www.twitter.com or befriended one client or another on www.facebook.com or connected with clients on www.linkedin.com in order to gather information on trends in creation and nature of jobs (*networking – linking with clients*).

Agencies often sought to get information from their clients on plans to create jobs (*networking – investigating on future job plans*). They followed economic indicators, recognised economic reports, and used such data to predict creation of jobs (*predicting job creation trends – analysing data to forecast job creation*). Intuition also played a part in agencies' efforts to follow the course of job opportunities (*predicting job creation trends – analysing data to forecast job creation*). Partnerships allowed Posh to get jobs at periodic times for the internship-seeking section of its candidates, and also to get notifications when jobs arose in the partner organizations (*networking – communication with job sources*). Figure 48 shows codes for tracking the job and corresponding indicators.

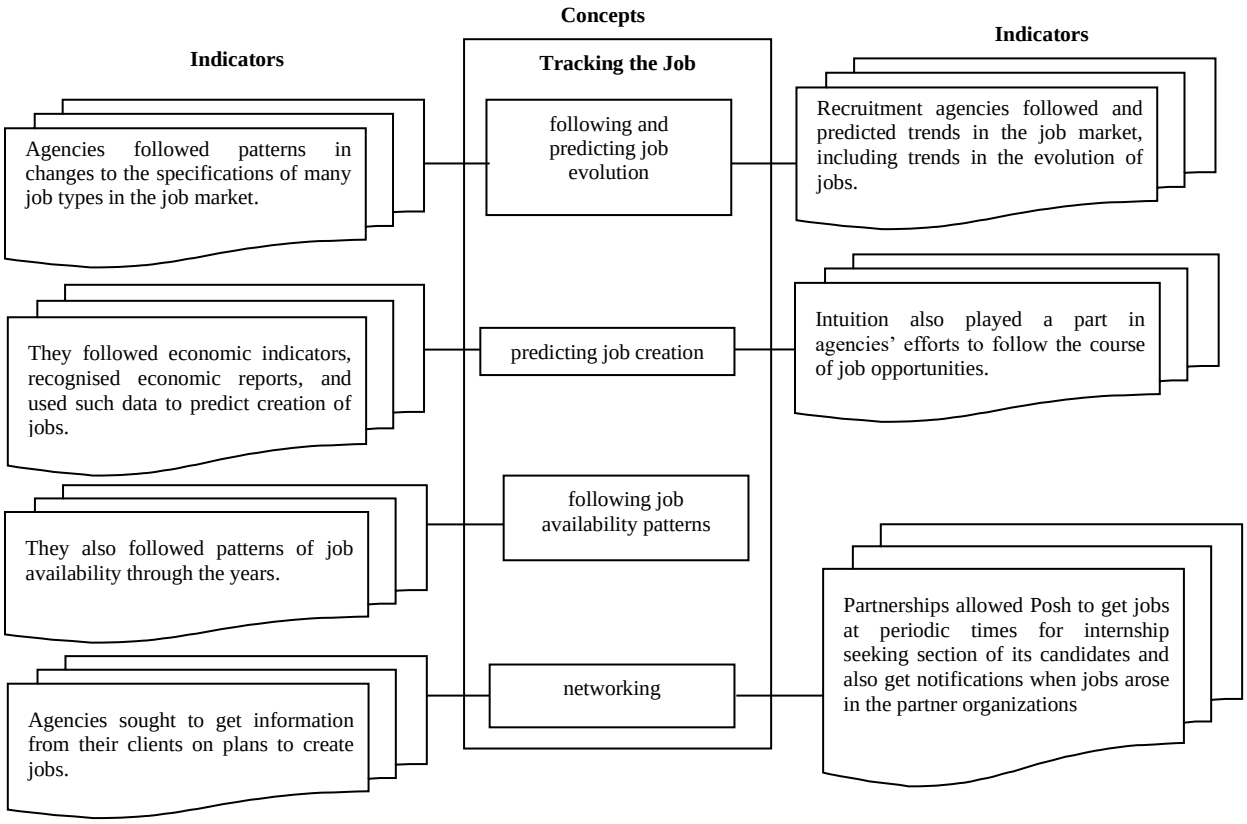


Figure 48: Derivation of Tracking the Job (Recruitment Agencies)

5.4.2.3 Tracking the Client

Recruitment agencies got jobs from clients and TalentScout financed its business operations by charging clients. Thus, it was essential for recruitment agencies to track clients and potential clients. Recruitment agencies followed patterns in clients' needs and wants (*following needs patterns* – *following client needs and wants*) and also predicted these (*predicting needs and wants* – *predicting client needs and wants*) so as to be able to serve them well. TalentScout put much effort in trying to attract clients for recruitment activities (*networking* – *attracting clients*). Through its web-presence and reviews on its www.facebook.com account, TalentScout allowed clients to observe that it had the candidates that clients were looking for (*networking* – *attracting clients*). In addition to its use of the Internet, TalentScout visited the physical locations of potential clients if and when necessary to convince the potential client to be a client (*networking* – *attracting clients*).

DevSite targeted other recruitment agencies as potential clients (*recycling clients –having clients of clients*). Job vacancies were posted on its website, and channelled to its www.facebook.com account, www.twitter.com account, and www.linkedIn.com account (*networking – attracting clients*).

Posh had a substantial catalogue of clients and on its website it encouraged industry and commerce to register with it (*networking – establishing contact with clients*). Through workshops, telephonic conversations, traditional means and online activities Posh successfully sought for clients (*networking – communication*). The derivation of tracking the client is summarised in Figure 49**.**

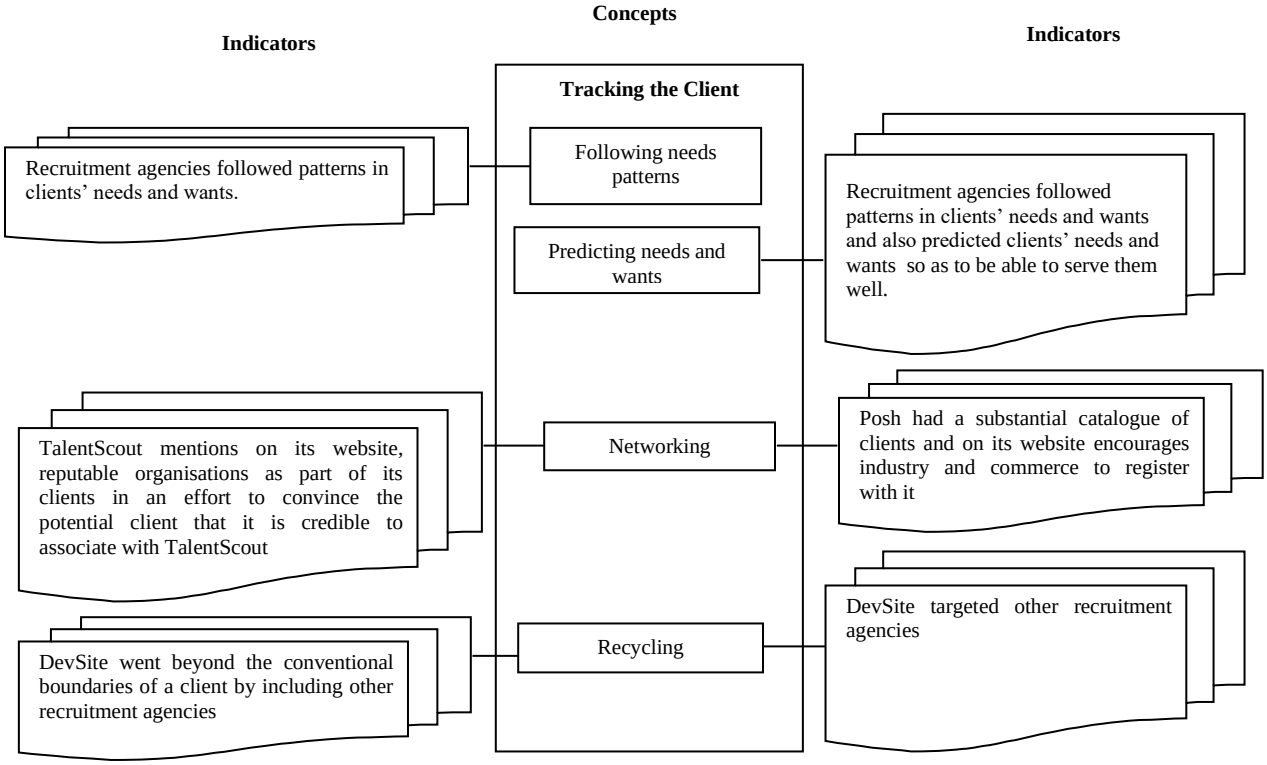


Figure 49: Derivation of Tracking the Client

5.4.2.4 Tracking the Candidate

There was no shortage of jobseekers in Namibia, but what recruitment agencies looked for were jobseekers with qualities that fitted jobs the agencies got from their clients (*selecting suitable candidates – choosing from many*). The number of suitable candidates overwhelmed some jobs and only fine margins

separated the candidates (*selecting suitable candidates* – *choosing from many*), while with some jobs it was very difficult to find suitable candidates (*searching for candidates* – *choosing from many*); either way the recruitment agencies realised the need to attract candidates (*attracting candidates* – *attracting suitable candidates*).

On its website, TalentScout emphasised meeting each candidate in person as part of the candidate registration process (*networking* – *encouraging candidates to connect*), but this could only take place if TalentScout managed to find potential candidates and convince them to register (*networking* – *encouraging candidates to connect*). TalentScout provided contact details in the form of physical address, email address and telephone number on all its online platforms, and it also had its number in the traditional telephone directory (*networking* – *encouraging candidates to connect*).

DevSite provided online registration space to candidates (*networking* – *encouraging candidates to connect*). By providing such space for candidates to share information on jobs they were looking for DevSite tried to give what other recruitment agencies were not giving (*networking* – *encouraging candidates to connect*). Other services provided by DevSite to incentivise candidates to register with it included online job notifications to registered candidates via emails and social media accounts like www.facebook.com (*networking* – *encouraging candidates to connect*).

Potential candidates were many for Posh as it dealt with the youth (the majority of jobseekers in Namibia), but it had to encourage them to use its services (*inviting* – *encouraging candidates to connect*). Posh tried to appeal to this generation of candidates by going online (*networking* – *reaching out to candidates*), however it did not abandon the tried and tested traditional means of recruitment after reasoning that its target candidates did not always have the means to stay online all the time. Posh held workshops (advertised on social and other media) aimed at linking its clients with its candidates and potential candidates and at the same time taking the opportunity of the workshop to convince potential

candidates to register with it (*networking* – *reaching out to candidates*). Figure 50 illustrares the derivation of tracking the candidate.

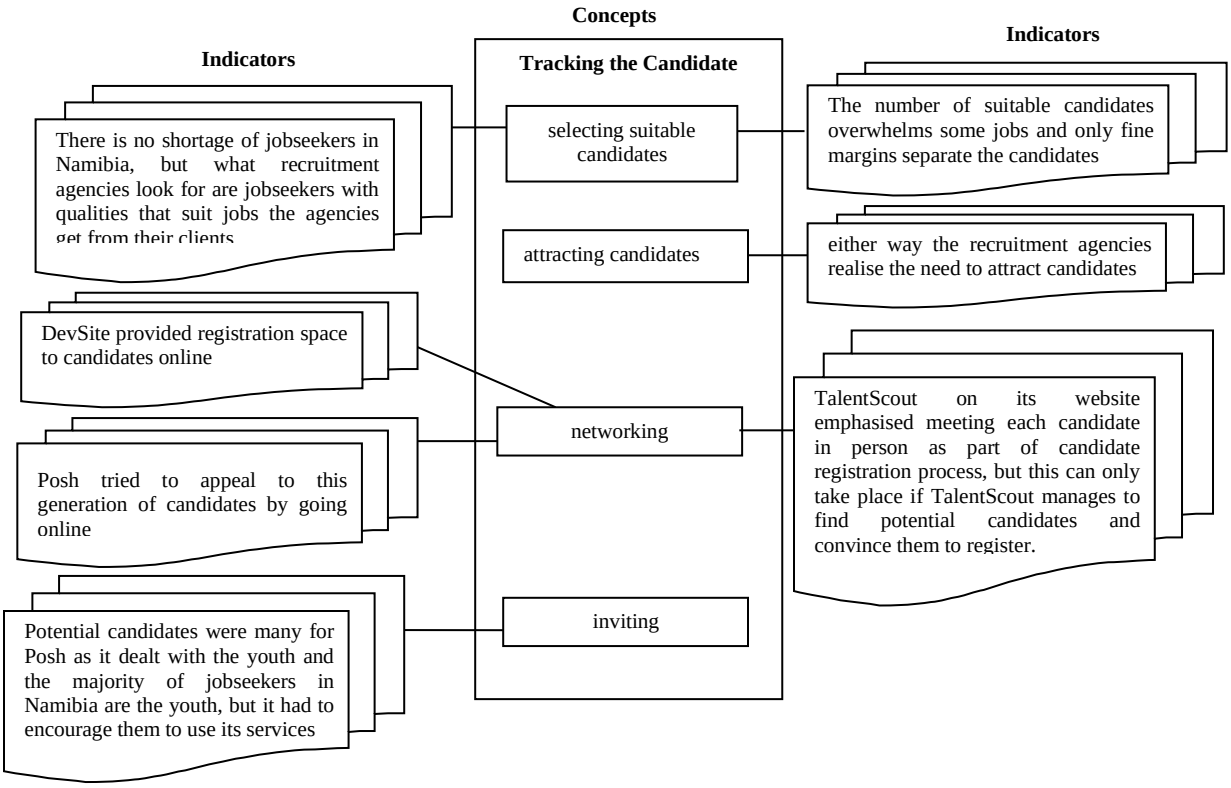


Figure 50: Derivation of Tracking the Candidate

5.4.2.5 Tracking Recruitment Agency

Recruitment agencies defined themselves by their identity (often contained in their mission, vision, and values), whether explicitly stated or otherwise; and the behaviour of recruitment agencies to honour that self-definition. The envisioned ideal recruitment agency was the object to be pursued by the recruitment agencies (*tracking recruitment agency*).

TalentScout focussed its recruitment activities on three major urban areas namely Windhoek, Walvis Bay and Swakopmund (*following delimits on geography of operation* – *delimiting geographic area of operation*). It sought to go beyond clients' and candidates' expectation in recruitment service provision and be ahead of all other recruitment service providers in Namibia (*following agency's service goals* –

aiming for set service goals). TalentScout strove to go beyond expectations by gaining knowledge on its clients' corporate culture through physical visits and face-to-face meetings with them (*following agency's service goals* – *aiming for set service goals*). It also ranked respect for candidates highly and enshrined that in its website pages, and stated that having face-to-face interviews with its candidates as a step in the registration process allowed it to understand its candidates' expectations (*following agency's service goals* – *aiming for set service goals*).

DevSite focussed on simplicity in its website and free advertising of jobs on its website (*following agency's information technology philosophy* – *aiming at simplicity*). Considering that jobs posted on DevSite's website were quickly replicated on social media platforms it can be inferred that DevSite strived to make its operations effective (*following agency's effectiveness goals* – *aiming for set effectiveness*).

Posh's website aimed at linking early career jobseekers, industry and training practitioners and providing working and learning opportunities for post-secondary school jobseekers (*following agency's networking goals* – *aiming for set networking goal*). Posh valued integrity, professionalism and excellence in its operations. Posh sought to maintain progress in its performance by benchmarking against best practice. Figure 51 shows the derivation of *tracking the recruitment agency*.

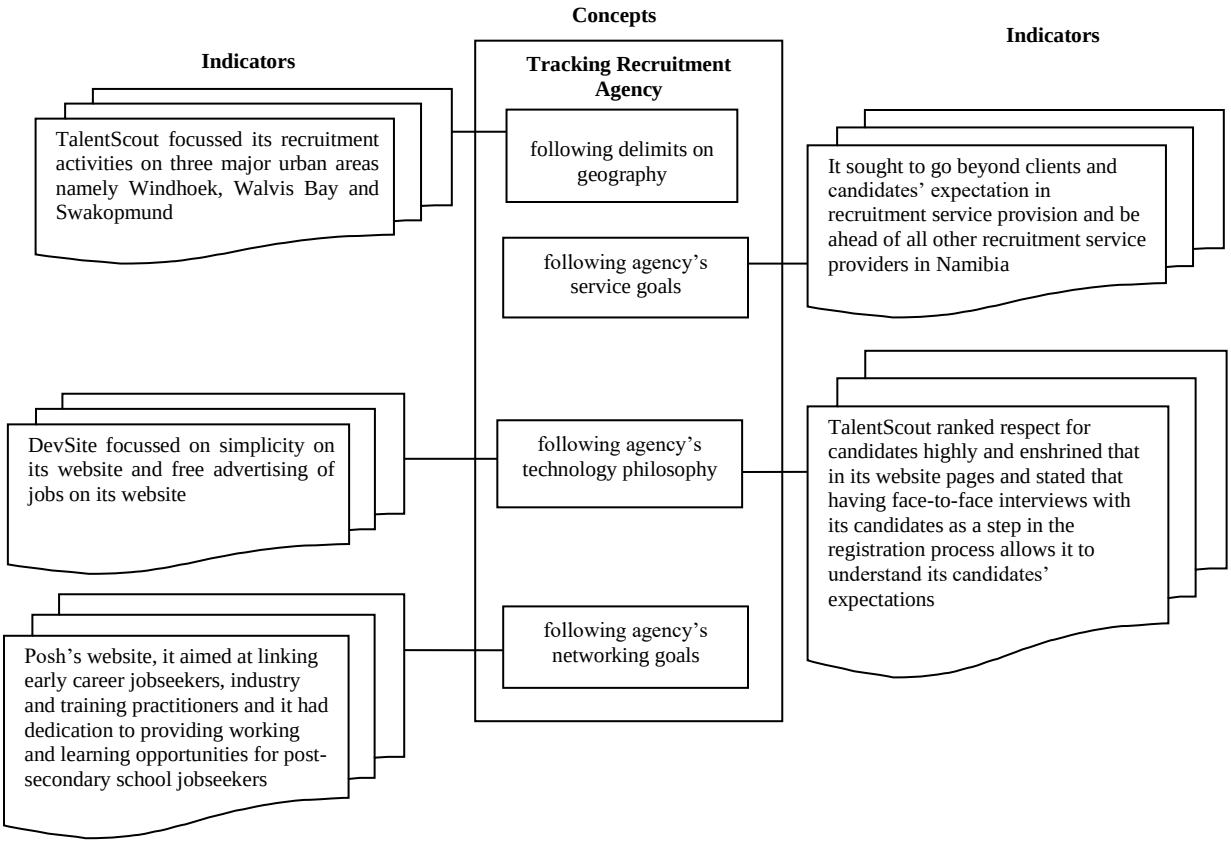


Figure 51: Derivation of Tracking Recruitment Agency

5.5 Derivation of Positioning for Fit

Positioning for fit is a category that captures how recruitment agencies positioned themselves. Recruitment agencies positioned themselves to get the best of information technology, jobs, clients, candidates and themselves. Three subcategories define *positioning for fit*, namely *seeking a position*, *registering a position* and *affirming a position* (Figure 52).

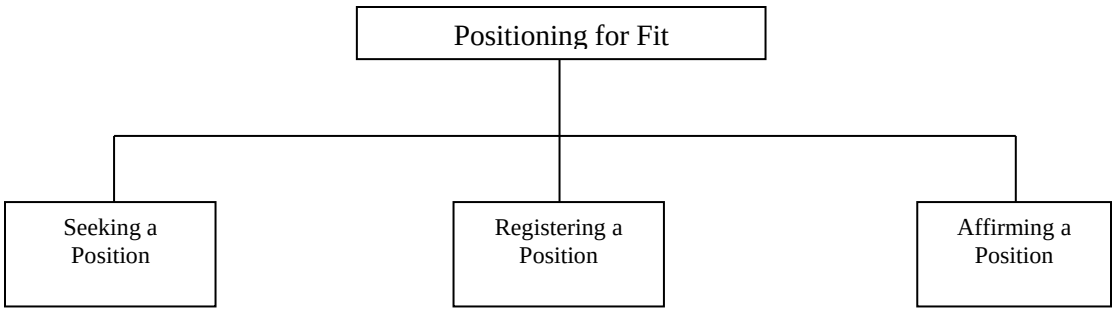


Figure 52: Subcategories of Positioning for Fit – Recruitment Agencies

The following subsections explain these three subcategories. As in section 5.4, when data provides an indicator to an open code, the label for the open code will be written and underlined, additionally I give a short description/explanation of the open code (e.g. *<u>label of open code</u> – description of indicator*) (see sections below).

5.5.1 Seeking a Position

Recruitment agencies sought geographic positions, cyber positions and psychological positions, which help in the resolution of lack of fit. However, instead of *waving the placard* they engaged in *advertising* to get a position or *requesting for a position*.

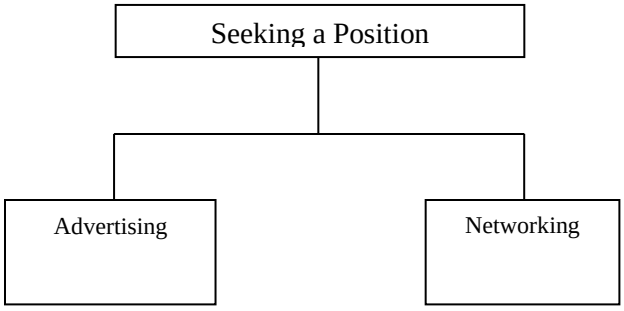


Figure 53: Subcategories of Seeking a Position – Recruitment Agencies

5.5.1.1 Advertising

On its website, TalentScout indicated that it visited its potential clients for face-to-face meetings (*<u>soliciting for a position</u> – wooing the potential client to gain psychological position*). In addition to client visits, TalentScout posted job adverts in newspapers and along with the adverts, it invited clients to do

business with it (*soliciting for a position – wooing the potential client to gain psychological position*). TalentScout also redirected potential clients from the newspapers and websites to its offices for help with recruitment services (*wooing for a position – wooing the potential client to gain psychological position*).

DevSite allowed other recruitment agencies to post job adverts on its website and such goodwill indicated its presence and availability to help in the operations of recruitment agencies (*soliciting for a position – wooing the potential client for a psychological position*). DevSite, by allowing any organization with a job to advertise to use its platform, made the organisations think about using its services (*soliciting for a position – wooing the potential client for a psychological position*).

Posh informed potential clients that it did not require payment for the services it provided and by so doing attracted clients (*incentivising for a position – giving services for free to gain psychological position in potential client*). Posh organised joint workshops between clients, itself, and candidates at which they discussed recruitment and other topics (*networking for a position – networking with potential clients to gain psychological position*).

TalentScout captured the attention of candidates by advertising preferable jobs and offering to help candidates get those jobs (*incentivising for a position – giving services for free to gain psychological position in candidate*). On its website and on www.facebook.com TalentScout advertised itself to candidates and clients alike as an organization that was reliable in recruitment and recruitment-related services (*soliciting for a position – wooing the potential client for a psychological position*). Advertising its name did not end online for TalentScout: when I visited its premises, I observed a clear billboard advertising TalentScout's name which directed visitors to its offices (*soliciting for a position – wooing the potential client for a psychological position*). Inside the offices, there were wall posters advertising TalentScout's name and recruitment services it offered (*soliciting for a position – wooing the potential client for a psychological position*).

DevSite also provided an online system, which candidates found simple and easy to use and it was free (*incentivising for a position – giving services for free to gain psychological position in candidate*). See Figure 54 for diagrammatic representation of derivation of Advertising to get a Position.

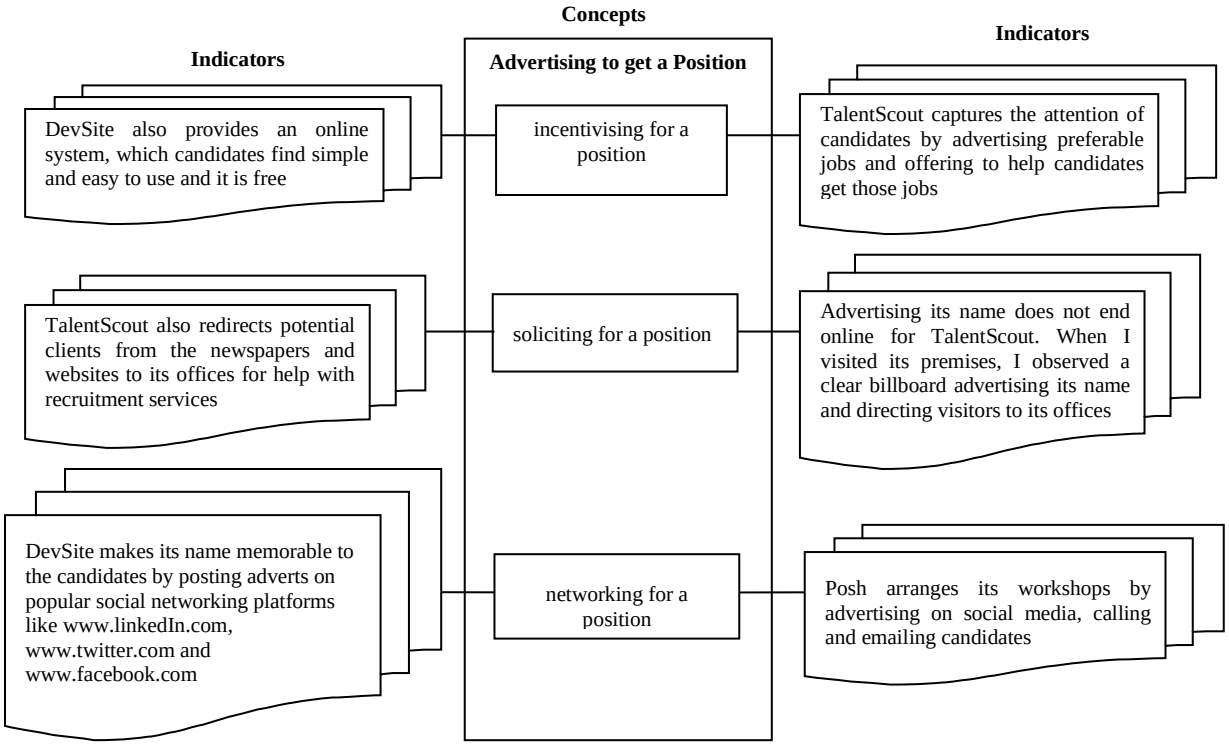


Figure 54: Derivation of Advertising to get a Position

5.5.1.2 Networking

DevSite made its name memorable to the candidates by posting statements on popular social networking platforms like www.linkedIn.com, www.twitter.com and www.facebook.com (*communicating – networking to get a position*).

Posh hosted workshops in an effort to link candidates and industry. The workshops captured the attention of candidates (*conferring – networking to get a position*). Posh arranged its workshops by advertising on social media, calling and emailing candidates (*communicating – networking with candidates to gain psychological position*). See Figure 55 for a diagrammatic representation of the derivation of *networking*.

TalentScout, like DevSite and Posh had presence on social networking platforms and relied on word of mouth to connect with stakeholders.

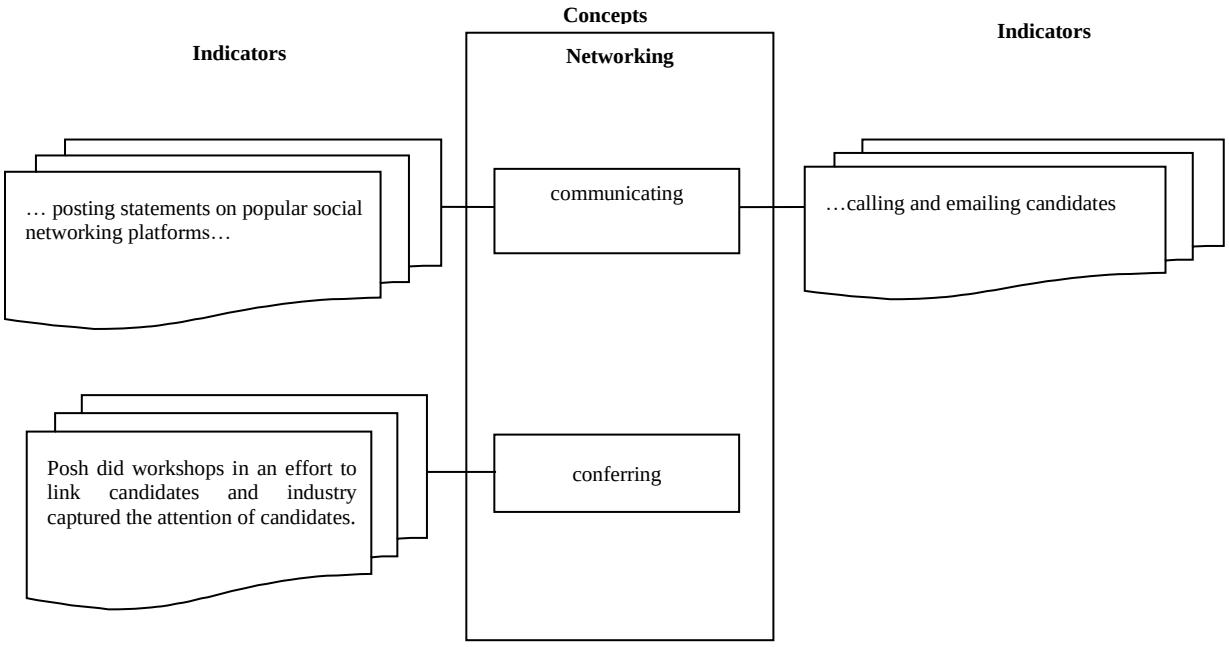


Figure 55: Derivation of Networking – Recruitment Agencies

5.5.2 Registering a Position

Registering a position is about anchoring or making claim of a particular portion of space (position) in a physical, cyber, psychological or other positional sense. Recruitment agencies registered positions in several ways, both electronically and traditionally. The subcategories of registering a position are; *registering cyber-position*, *registering physical position* and *registering psychological position* (see Figure 56).

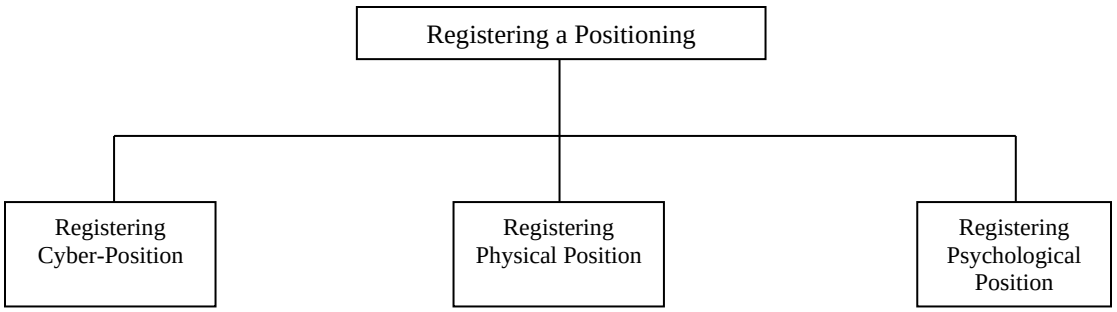


Figure 56: Subcategories of Registering a Position – Recruitment Agencies

5.5.2.1 Registering Cyber-Position

Recruitment agencies established their online presence in varying ways and to varying degrees. TalentScout registered a website, created email accounts and social media accounts on www.linkedIn.com, and www.facebook.com (*creating account – by registering online*). Occasionally, TalentScout took space in daily traditional newspapers when it advertised jobs. DevSite published a website (*claiming cyber location – registering online*). In addition to the website, DevSite like TalentScout created social media accounts on www.linkedIn.com, www.twitter.com and www.facebook.com (*claiming cyber location – registering online*). Posh created social media accounts in the form of www.linkedIn.com, www.facebook.com and www.twitter.com (*claiming cyber location – registering online*) and web pages (*publishing location – registering online*). All three recruitment agencies had registered online domain names (*creating account – registering a domain*).

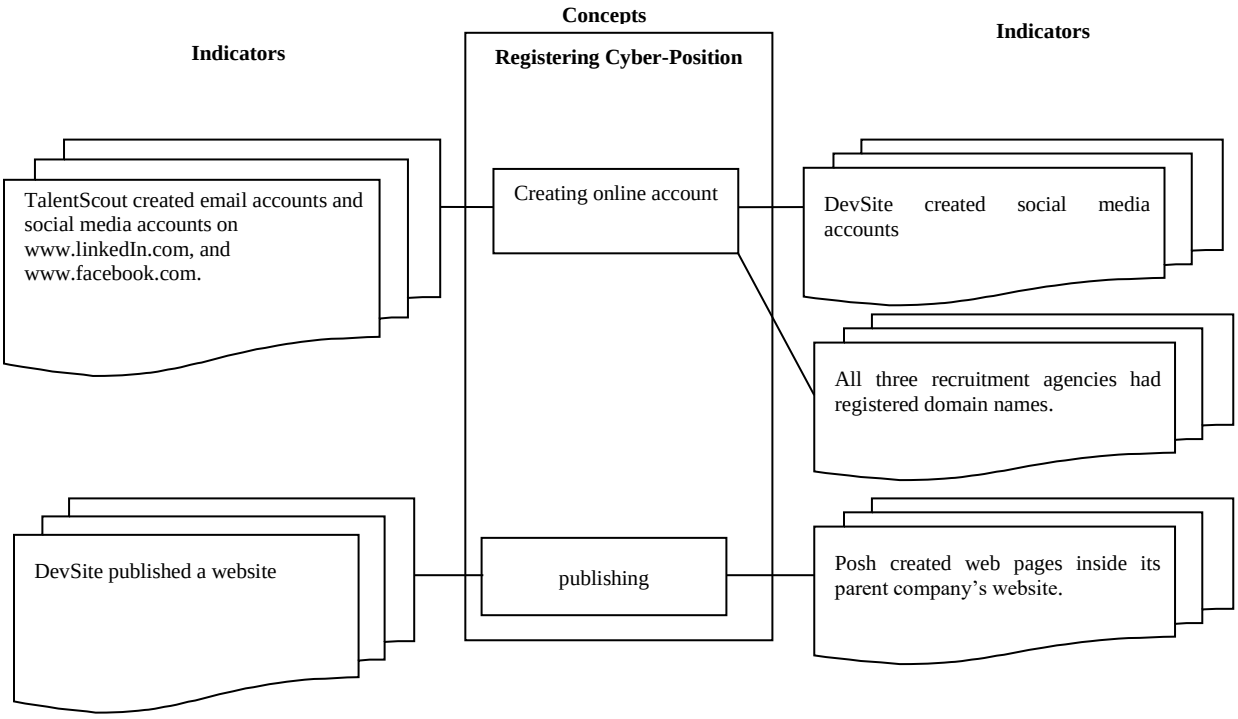


Figure 57: Derivation of Registering Cyber-Position - Recruitment Agencies

5.5.2.2 Registering Physical Position

TalentScout had physical office space (*acquiring physical space* – *renting or buying office space*) and its phone and physical location details were in the business information directories of Namibia, traditional phone directory (*publishing physical space* – *leasing traditional media space*) and online. TalentScout registered several positions in a number of ways; it registered a post office box number (*acquiring physical location* – *renting or leasing physical location*) in Windhoek where its stakeholders came for its services. The physical location was close to a main road and was easily accessible from several directions by road. Posh had physical premises close to town and to major roads. Both TalentScout and Posh occupied their premises for purpose of their recruitment activities (*occupying physical space* – *relevant presence in physical space*). Figure 58 gives a diagrammatic representation of registering physical position.

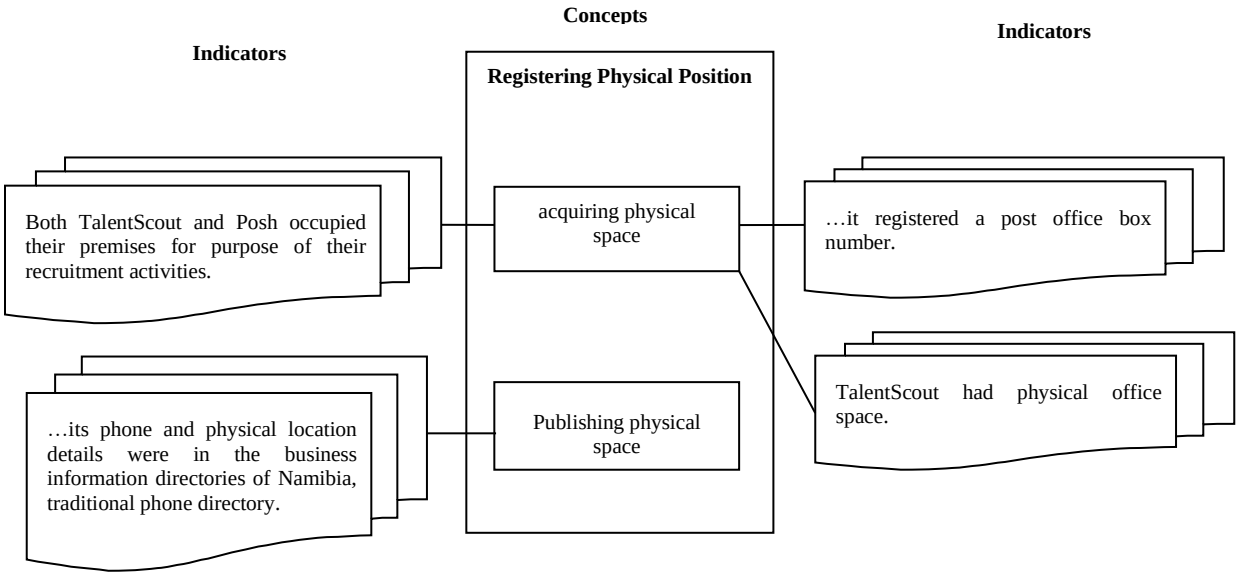


Figure 58: Derivation of Registering Physical Position – Recruitment Agencies

5.5.2.3 Registering Psychological Position

Recruitment agencies employed several approaches to get noticed and remembered by recruitment stakeholders. Posh's adverts appeared in press and on radio (*advertising* – *putting advertisements out*). Sheron of TalentScout invited me to "like" them on www.facebook.com and give a review of their services on the Internet (*claiming expertise* – *having many positive reviews*). Other recruitment agencies also indicated that they had been assisting with recruitment for a long time (*claiming expertise* – *having extensive experience*). The recruitment agencies also announced online many of their current and previous "well served" (*claiming expertise* – *having extensive experience*) clients (*claiming attractiveness* – *having many clients*). DevSite said it was the best in the country (*comparing favourably* – *being the best*). The derivation of registering a psychological position is diagrammatically captured in Figure 59.

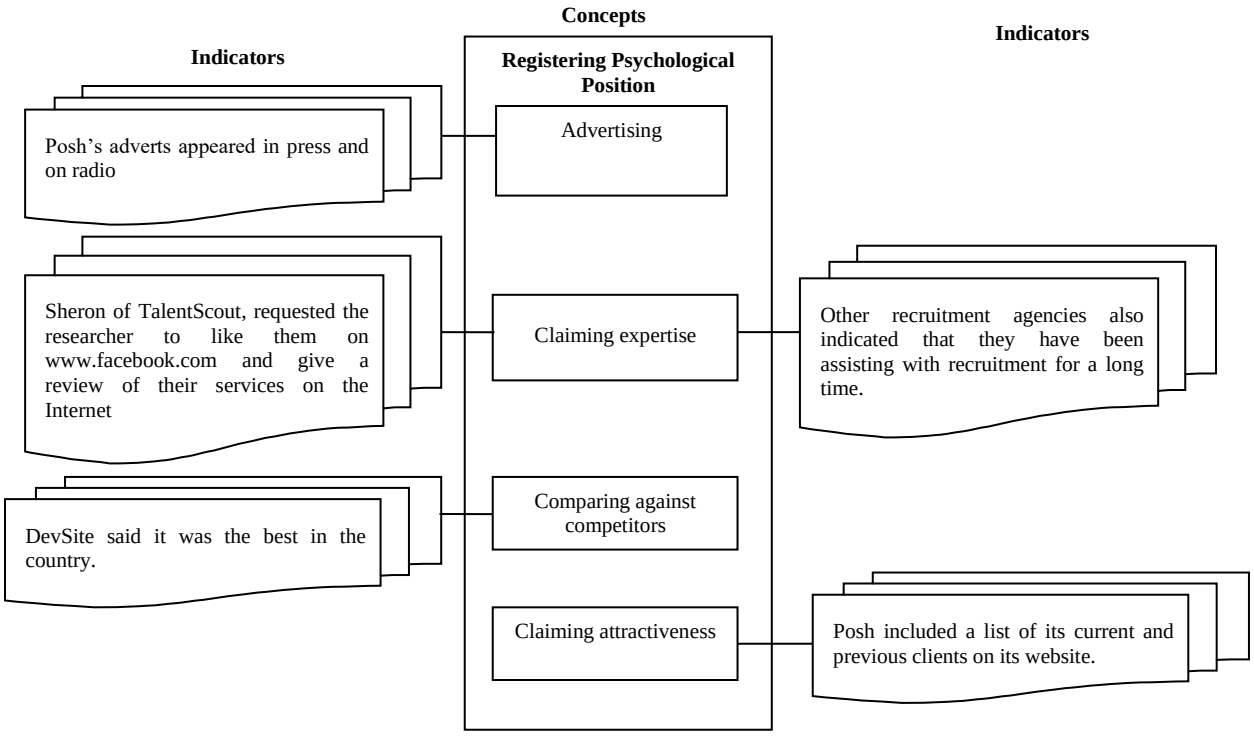


Figure 59: Derivation of Registering Psychological Position – Recruitment Agencies

5.5.3 Affirming a Position

Affirming a position captures how recruitment agencies maintained positions after registering them. *Publicising occupancy* and *protecting a position* are the subcategories of *affirming a position* (Figure 60), which was meant to strengthen a recruitment agency's hold on a position among other goals.

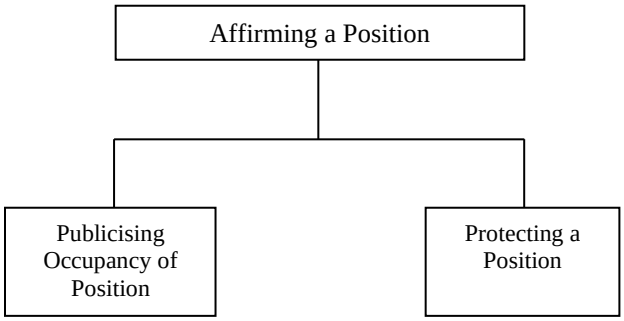


Figure 60: Subcategories of Affirming a Position – Recruitment Agencies

5.5.3.1 Publicising Occupancy of Position

Publicising occupancy of a position is a subcategory, which captures how recruitment agencies made it known to stakeholders in recruitment that the recruitment agency occupied a particular position.

TalentScout had its mission, vision and values posted on its website for all to see (*publishing position details – by posting them online*). It also provided information on its physical location, services it provided, and clients it served on the same website (*publishing position details – by posting them online*). The same information was sometimes availed in newspapers and marketing material produced by TalentScout (*distributing position details – by providing them to newspapers*).

DevSite, like TalentScout made its occupation of cyber-position visible to Internet users (*publishing position details – by posting them online*). It reached out to people, sharing the nature and state of its position by defining the services it provided to clients. Sharing of information on the nature and state of its position was done online, in newspapers and other media (*distributing position details – by providing them to varied media*).

Aside from being online to announce its positions and services, Posh also relied on word of mouth to publicise its positions (*distributing position details – by providing them to varied media*). Loini from Posh requested me to give a review of Posh online because it would help bring stakeholders' attention to Posh (*networking – having a third party publicising details*). Posh distributed marketing material during workshops and at any time to visitors to its offices (*distributing position details – by providing them to stakeholders*). Posh had what it called 'partners' to help in distributing information about its positions (*distributing position details – by providing them to stakeholders*).

As part of publicising their positions, all three recruitment agencies established networks with stakeholders by having connections either on www.linkedIn.com, or friends on www.facebook.com or

followers on www.twitter.com (*networking* – *having a third party publicising details*). Figure 61 shows the derivation of *publicising occupancy of a position*.

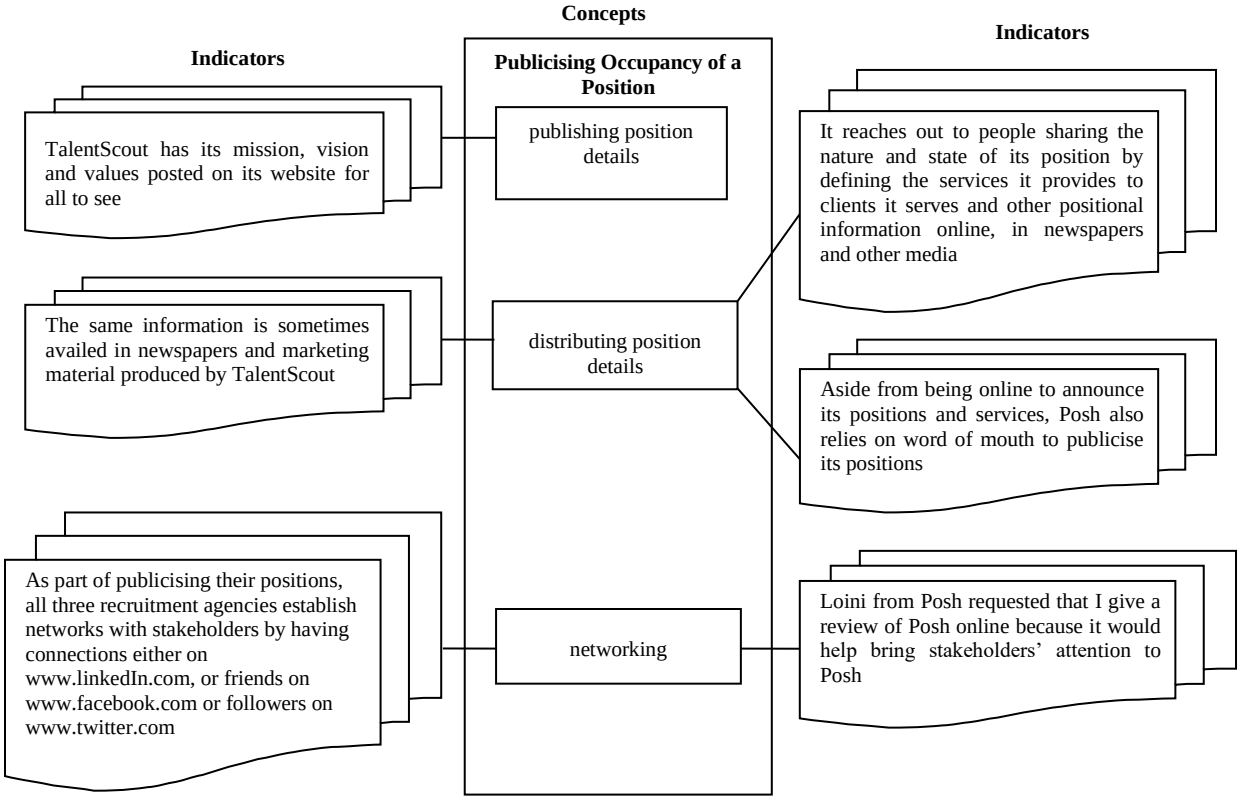


Figure 61: Derivation of Publicising Occupancy – Recruitment Agencies

5.5.3.2 Protecting a Position

Registering an account on www.linkedIn.com, www.facebook.com or www.twitter.com requires a recruitment agency to create a password and keep it secret (*concealing access* – *by using password*). Recruitment agencies maintained secrecy of passwords for as long as they wanted to maintain their cyber positions otherwise rogue elements could compromise their online presence (*concealing access* – *by using password*). All recruitment agencies put measures in place to protect their positions from competitors e.g. cyber-positions were protected using passwords, encryption of data, etc and physical positions were protected using perimeter walls, guards, etc (*securing a position* – *using physical and technological means*) and monitored using closed-circuit television (CCTV), guards, alarms, etc.

Providing satisfactory services to stakeholders meant recruitment agencies were able to maintain positions in the psyche of stakeholders and keep their networks alive (*serving satisfactorily – keeping position of service*). Figure 62 shows the derivation of *protecting a position*.

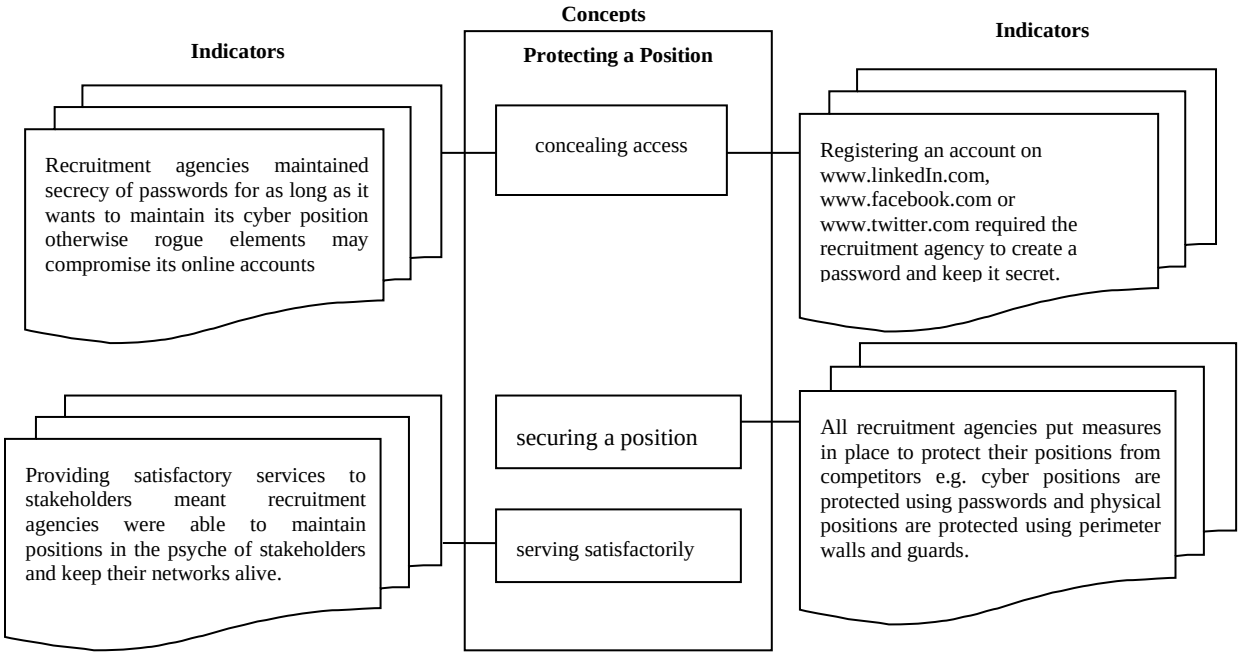


Figure 62: Derivation of Protecting a Position – Recruitment Agencies

5.6 The Purpose of Recruitment Agencies' Behaviour (Pursuing Fit)

I concluded that the purpose served by recruitment agencies' behaviour is to achieve fit between the different *objects of concern*. The process of achieving fit is what I called *pursuing fit* in this study. A detailed discussion of *pursuing fit* is in Chapter 6.

5.7 Summary of the Chapter

The chapter gave profiles of recruitment agencies in the study while maintaining their privacy and confidentiality. After identification of *objects of concern* for recruitment agencies, the chapter presented the emergence of categories from data related to the recruitment agencies. The two major categories derived are *interpreting fit* and *positioning for fit*.

CHAPTER 6: ANALYSIS OF FINDINGS – DEFINING PURSUING FIT

6.1 Introduction

This chapter uses theoretical codes to relate categories derived in Chapters 4 and 5. The chapter presents a top-down approach in showing the derivation of theoretical codes relating categories in the grounded theory (*pursuing fit*). Therefore, the chapter first presents an overview of *pursuing fit* and then details relations between categories of *pursuing fit*. The resultant grounded theory (*pursuing fit*) meets the research objectives stated in Chapter 1 by indicating the main concern (*fit*) and how it was resolved by the core category (*pursuing fit*). Therefore, this chapter relates to transliterated memos (see Appendix C) written during the coding process and uses resultant theoretical codes to relate categories in *pursuing fit*.

6.2 Pursuing Fit (Core Category)

Jobseekers and recruitment agencies resolve the problem of lack of fit by *pursuing fit*. *Pursuing fit* is a process of resolving problems of low fit by manipulating *objects of concern* to meet each of their expectations. *Pursuing fit* (Figure 63) starts with *objects of concern* having initial values for their attributes, which are independent of any interpretation by actors in recruitment (objective values). New values may be assigned to objects of concern (more precisely, to attributes of *objects of concern*). The values may change because of interpretation during *interpreting fit* and *positioning for fit* which leads to construction of new values for *objects of concern*. When alignment is reached between all *objects of convern* fit is achieved, and the main concern is resolved. (see Figure 63).

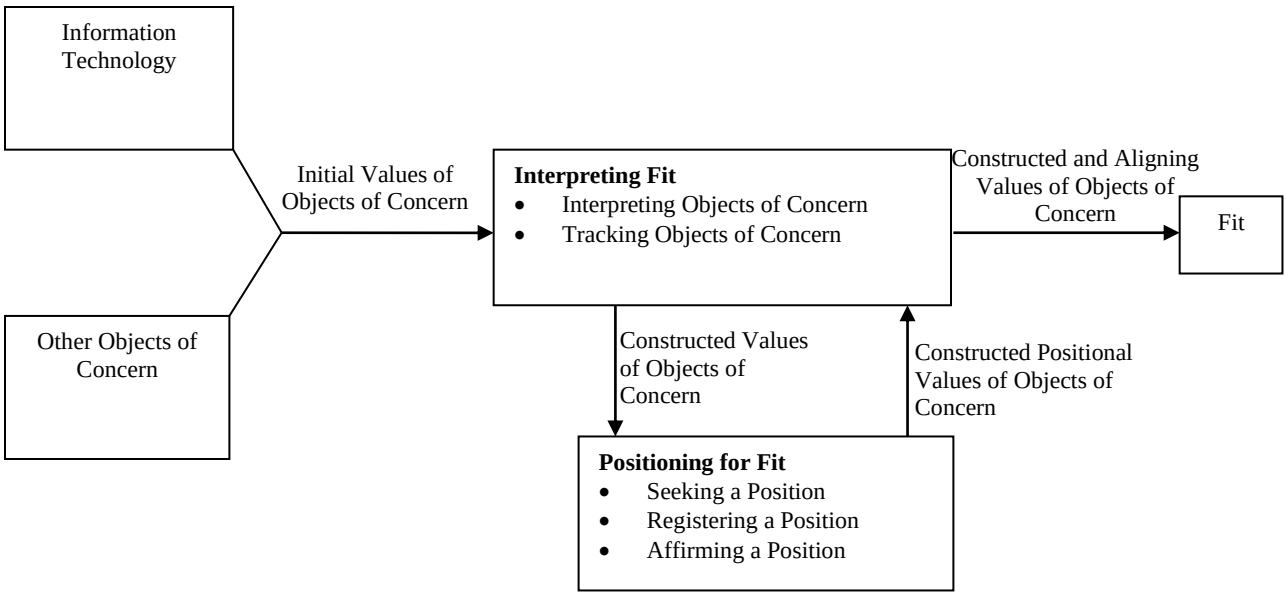


Figure 63: A Schematic of Pursuing Fit

6.2.1 Emergence of Pursuing Fit and the Main Concern (Fit)

Two categories, *interpreting fit* and *positioning for fit* emerged as candidate core categories. However, none of the two satisfied the criteria for a core category. The collective of the two categories met most essential requirements for a core category. I determined that the two categories constituted the process of *pursuing fit*; hence, the core category emerged as *pursuing fit*.

The main concern in this study is *fit*. *Fit* is high between *objects of concern* if *constructed attributes of the objects of concern* are aligned or mutually suitable for the required outcome to occur. Jobseekers and recruitment agencies have to fit, jobseekers and technologies have to fit, jobseekers and jobs have to fit, recruitment agencies and technologies have to fit, recruitment agencies and jobs have to fit, and technologies and jobs have to fit as well. Low fit is a result of many factors including the dynamic nature of the recruitment phenomenon influenced by among other factors, rapid changes in electronic technologies.

I uncovered the main concern by constantly noting the problem respondents in the research were trying to resolve. The question leading to the researcher wanting to find the main concern was, "What is the basic

social psychological problem faced by participants in the action scene?" (Glaser, 1978, p. 57). The main concern is the problem faced by people in the phenomenon the researcher is studying (Glaser, 1978). The main concern is the core problem (Glaser, 2015 p. 9).

The approach used in this study was to let the data indicate what was happening in e-recruitment. I uncovered the main concern through what the data provided in response to the general questions; "What is happening here?" (Glaser, 1998) and "What is this data a study of?" (Glaser, 1978, p. 57). The more direct question "What is the participant's main concern?" (Glaser, 1998, p. 140). The participants' ways of trying to resolve the main concern bring out the core category (Glaser, 2014, pp. 73–74).

6.2.2 Hierarchy of Categories in Pursuing Fit

After the findings in chapters 5 and 6, I adhered to guidelines for determining the core category. *Pursuing fit* emerged as the core category with subcategories *interpreting fit* and *positioning for fit*. Subcategories of *interpreting fit* are *interpreting objects of concern* and *tracking objects of concern* and subcategories of *positioning for fit* are *seeking a position*, *registering a position* and *affirming a position*. Figure 64 shows a schematic representation of the hierarchy of categories in *pursuing fit*.

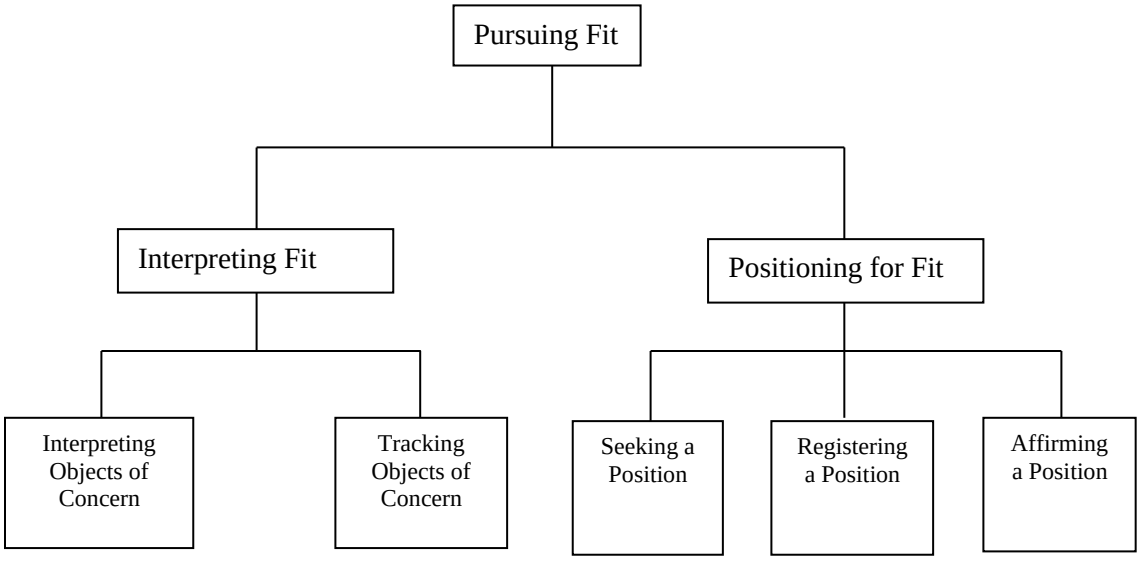


Figure 64: Hierarchy of Categories in Pursuing Fit

6.3 Relationships in Interpreting Fit

Interpreting fit is a cyclic process with two major steps corresponding to its two subcategories (*interpreting objects of concern* and *tracking objects of concern*). Figure 65 is a diagram showing the two stages in *interpreting fit*. *Interpreting objects of concern* and *tracking objects of concern* inform each other, resulting in a cycle that ends with the resolution of the main concern (lack of) *fit*. Standard flowchart symbol meanings apply in Figure 65.

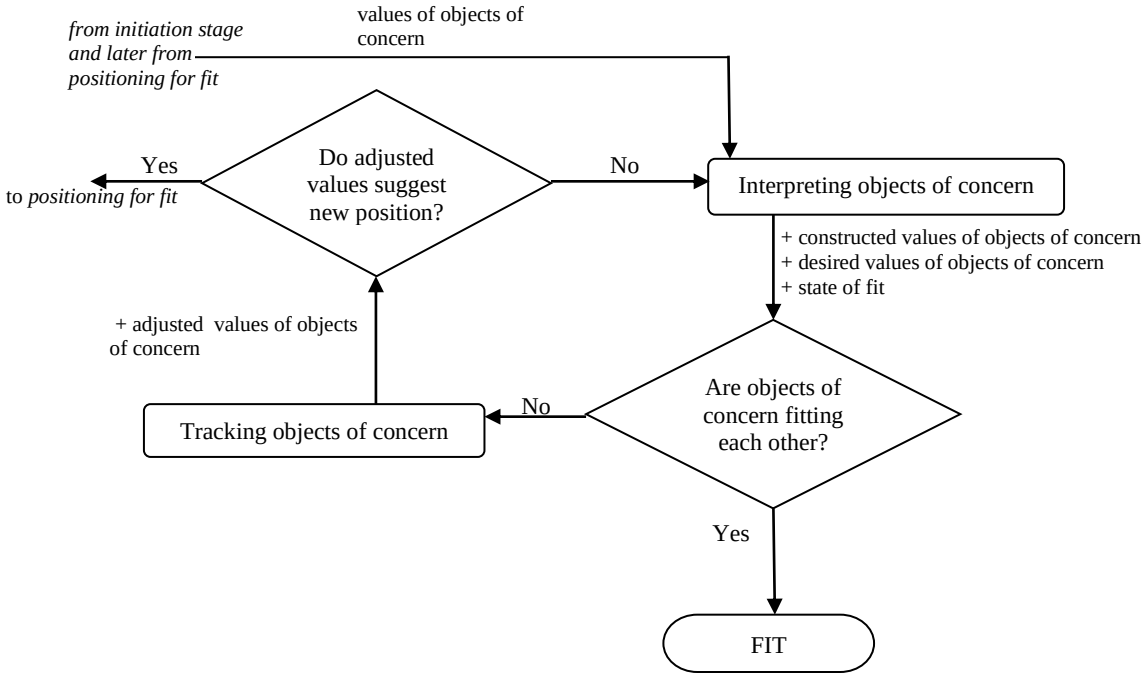


Figure 65: The Process of Interpreting Fit

Interpreting objects of concern is a pre-requisite to *tracking objects of concern* as it provides markers used in *tracking objects of concern*. As explained in Chapters 4 and 5 *tracking objects of concern* is a category capturing how participants in the research follow attributes necessary for fit to occur. If the outcome of *tracking objects of concern* does not result in fit, then *interpreting objects of concern* repeats.

Interpreting fit is a cyclic process, which relates *objects of concern* during *interpreting objects of concern* and *tracking objects of concern*. I start explaining these relationships under the subcategory *interpreting*

objects of concern followed by a scrutiny of relationships between *objects of concern* under the subcategory of *tracking objects of concern*.

6.3.1 Relationships of Objects of Concern in Interpreting Objects of Concern

The dominant relationships between objects of concern in *interpreting objects of concern* are between the interpreter and the interpreted. Evidence from the data indicated that job and information technology are *objects of concern*, which are not capable of interpreting other *objects of concern*, unlike jobseekers, job providers and recruitment agencies. Table 15 succinctly gives the interpretation relationships between *objects of concern* under the subcategory of *interpreting objects of concern*.

	Job	Information technology	Job provider	Jobseeker	Recruitment Agency
Job	n/a	n/a	Job is interpreted by job provider	Job is interpreted by jobseeker	Job is interpreted by recruitment agency
Information technology	n/a	n/a	Information technology are interpreted by job provider	Information technology are interpreted by jobseeker	Information technology are interpreted by recruitment agency
Job provider	Job provider interprets a job	Job provider interprets the information technology	Job provider interprets job provider	Job provider interprets jobseeker	Job provider interpets recruitment agency
Jobseeker	Jobseeker interprets a job	Jobseeker interprets the information technology	Jobseeker interprets the job provider	Jobseeker interprets jobseeker	Jobseeker interprets recruitment agency
Recruitment Agency	Recruitment agency interprets a job	Recruitment agency interprets the information technology	Recruitment agency interprets the job provider	Recruitment agency interprets the jobseeker	Recruitment agency interprets recruitment agency

Table 15: Matrix of Relationships between Objects of Concern

Recruitment agencies are at times job providers to jobseekers in cases where recruitment agencies define job details. Jobseekers and recruitment agencies both view employing organisations as job providers.

6.3.2 Relationships of Objects of Concern in Tracking Objects of Concern

Relationships of *objects of concern* under *tracking objects of concern* revolve around the *objects of concern* tracked and those tracking. For a job and a jobseeker, values of job attributes defined are values expected of a suitable jobseeker; hence, jobseekers strive to attain those values. As an example if the job specifies the value of the education property to be a degree, then the jobseeker is expected to have earned

a degree. Recruitment agencies hunt for jobseekers whose attributes coincide with those defined in job specifications. Table 16 is a matrix of relationships that exist between *objects of concern* under *tracking objects of concern*.

	Job	**Information technology**	**Job provider**	**Jobseeker**	**Recruitment Agency**
Job	n/a	n/a	Job is tracked by job provider	Job is tracked by jobseeker	Job is tracked by recruitment agency
Information technology	n/a	n/a	Information technology are tracked by job provider	Information technology are tracked by jobseeker	Information technology are tracked by recruitment agency
Job provider	Job provider tracks a job	Job provider tracks the information technology	Job provider tracks job provider	Job provider tracks jobseeker	Job provider tracks recruitment agency
Jobseeker	Jobseeker tracks a job	Jobseeker tracks the information technology	Jobseeker tracks the job provider	Jobseeker tracks the jobseeker	Jobseeker tracks recruitment agency
Recruitment Agency	Recruitment agency tracks a job	Recruitment agency tracks the information technology	Recruitment agency tracks the job provider	Recruitment agency tracks the jobseeker	Recruitment agency tracks the recruitment agency

Table 16: Matrix of Relationships between Objects of Concern in Tracking Objects of Concern

Recruitment agencies and jobseekers seek fitting information technologies after interpreting the job; they do not change the job specifications to suit the information technology, but they seek alternative technologies to fit job specifications. In the same vein, recruitment agencies do not change the job specifications to suit jobseekers but they select jobseekers that fit the job based on job specifications. Jobseekers do not change the job specifications to suit themselves, but they adjust their personal and professional attributes in line with the requirements of the job or anticipated requirements of the job (*tracking the objects of concern*). The information technology does not have an effect on the specification of the job, but the specifications of the job influences the choice of the information technology the jobseekers could use to fit with the job. All the above indicate the tracker and the tracked.

6.4 Relationships in Positioning for Fit

Positioning for fit in *pursuing fit* is a process defined by three sub-processes, *seeking a position*, *registering a position* and *affirming a position* as explained in Chapters 5 and 6. Jobseekers and recruitment agencies first look for positions to occupy (*seeking a position*) and then they secure

occupancy of the positions by *registering a position* through online registration (cyber-positioning), establishing physical presence (physical positioning) in recruitment infrastructure, and espousing a specific psychological position (psychological positioning) on matters of recruitment. Jobseekers and recruitment agencies then affirm attained positions (through *affirming a position*). Phases of *positioning for fit* receive input from the process of *interpreting fit* as shown in Figure 66. Processes in *positioning for fit* show iteration e.g. if a position is not found when *seeking a position* the process of *seeking a position* is repeated or the process goes back to *interpreting fit* (see Figure 66).

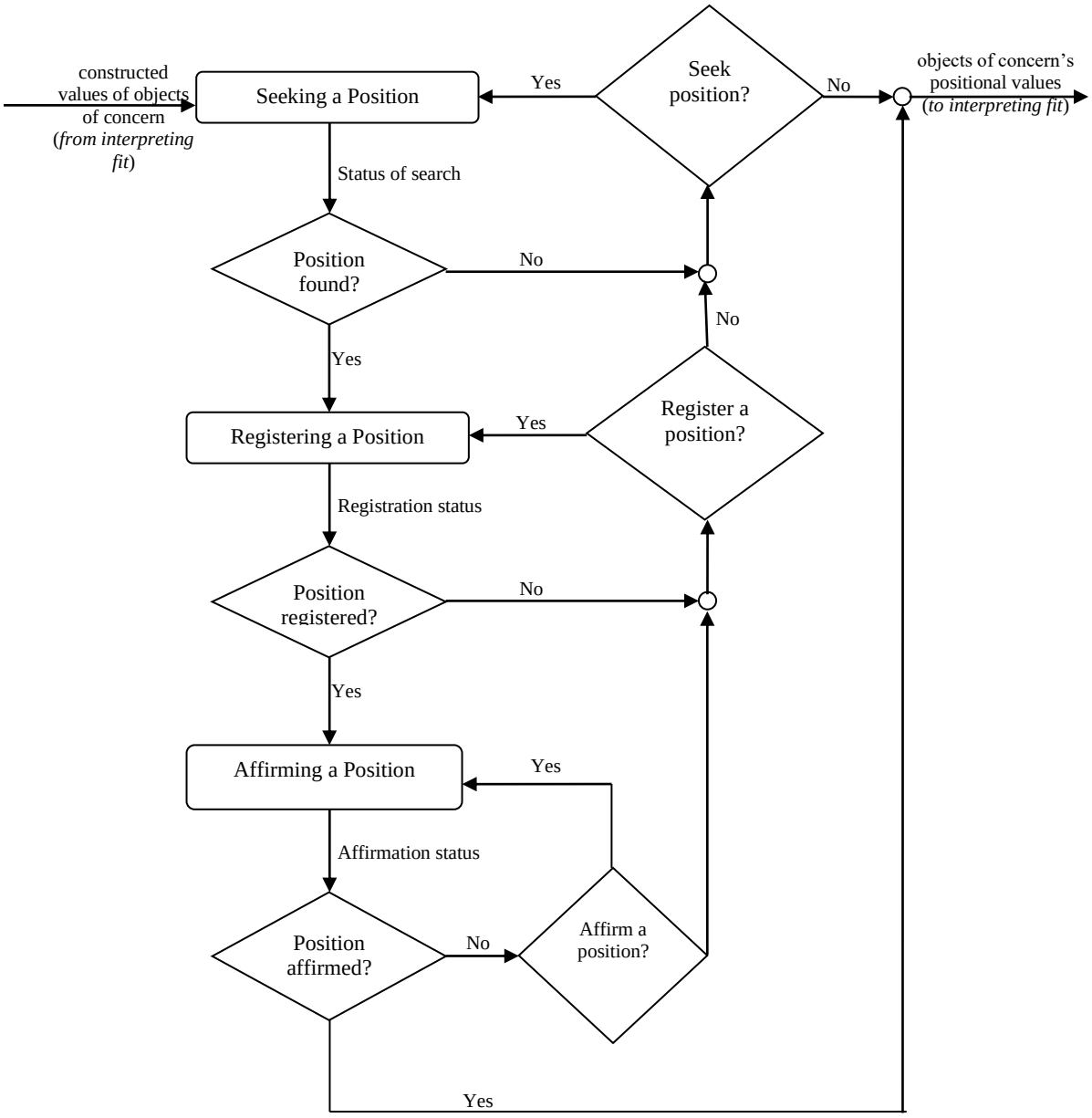


Figure 66: Process of Positioning for Fit

Once a position is registered, the process of affirming a position defines subsequent activities related to that *position*. *Affirming a position* is, as shown in Figure 66 informed by *constructed values of objects of concern*.

6.4.1 Relationships of Objects of Concern in Seeking a Position

The process of *seeking a position* involves objects of concern seeking positions. Job provider, jobseeker and recruitment agency can seek positions, but job and information technology cannot seek positions. Objects of concern capable of seeking positions do it for themselves and other objects of concern. The relationship matrix in Table 17 details the relationships between the objects of concern in the process of *seeking a position.*

	Job	**Information technology**	**Job Provider**	**Jobseeker**	**Recruitment Agency**
Job	n/a	Job has position sought on information technology	Job has position sought on job provider	Job has position sought on jobseeker	Job has position sought on recruitment agency
Information technology	Information technology has space for job	Information technology has position sought on information technology	Information technology has position sought on job provider	Information technology has position sought on jobseeker	Information technology has position sought on recruitment agency
Job Provider	Job provider has space for job	Job provider seeks position on information technology	Job provider seeks position on job provider	Job provider seeks position on jobseeker	Job provider seeks position on recruitment agency
Jobseeker	Jobseeker has space for job	Jobseeker seeks position on information technology	Jobseeker seeks position on job provider	Jobseeker seeks position on jobseeker	Jobseeker seeks position on recruitment agency

Table 17: Matrix of Relationships between Objects of concern in Seeking a Position

6.4.2 Relationships of Objects of Concern in Registering a Position

After deriving *registering a position* in Chapters 4 and 5, this section presents relationships between objects of concern under the subcategory of *registering a position*. These relationships are essential to note because noting them allows the jobseeker, recruitment agency and job providers to identify the *object of concern* that needs attention in the recruitment process.

Table 18 is a matrix that summarises the relationships between objects of concern in *registering a position*. The matrix in Table 18 is relevant to all types of positions (cyber, physical and psychological positions).

	Job	Information technology	Job provider	Jobseeker	Recruitment Agency
Job	n/a	Job is registered on information technology	Job is registered on job provider	Job is registered on jobseeker	Job is registered on recruitment agency
Information technology	Job is registered on information technology	Information technology is registered on information technology	Information technology is registered on job provider	Information technology is registered on jobseeker	Information technology is registered on recruitment agency
Job provider	Job is registered on job provider	Job provider registers a position on information technology	Job provider registers a position on job provider	Job provider registers a position on jobseeker	Job provider registers position on recruitment agency
Jobseeker	Job is registered on jobseeker	Jobseeker registers a position on information technology	Jobseeker registers a position on job provider	Jobseeker registers a position on jobseeker	Jobseeker registers a position on recruitment agency
Recruitment Agency	Job is registered on recruitment agency	Recruitment agency registers a position on information technology	Recruitment agency registers a position on job provider	Recruitment agency registers a position on jobseeker	Recruitment agency registers a position on recruitment agency

Table 18: Matrix of Relationships between Objects of Concern in Registering a Position

The relationship matrix shows that some objects of concern e.g. jobseeker, job provider and recruitment agency register positions with themselves; however inanimate or non-person-like *objects of concern* (e.g. job and information technology) are not capable of doing the same. None person or non-person-like objects of concern need the help of person or person-like *objects of concern* to register positions.

6.4.3 Relationships of Objects of concern in Affirming a Position

This section discusses the relationships of objects of concern in *affirming a position*. I used relationship matrices as in the previous sub section to show the relationships. I present the first of these relationship matrices in Table 19. In the matrix in Table 19, objects of concern affirm registered positions only.

	Job	Information technology	Job provider	Jobseeker	Recruitment Agency
Job	n/a	Job has position affirmed by job provider or recruitment agency on information technology	Job has position affirmed on job provider	Job has position affirmed on jobseeker	Job has position affirmed on recruitment agency
Information technology	Job's position on Information technology is affirmed	Information technology's position on Information technology is affirmed	Information technology's position on job provider is affirmed	Information technology's position on jobseeker is affirmed	Information technology's position on recruitment agency is affirmed
Job provider	Job's position on job provider is affirmed	Job provider affirms a position on information technology	Job provider affirms a position on job provider	Job provider affirms a position on jobseeker	Job provider affirms position on recruitment agency
Jobseeker	Job's position on jobseeker is affirmed	Jobseeker affirms a position on information technology	Jobseeker affirms a position on job provider	Jobseeker affirms a position on jobseeker	Jobseeker affirms a position on recruitment agency
Recruitment Agency	Job's position on recruitment agency is affirmed	Recruitment agency affirms a position on information technology	Recruitment agency affirms a position on job provider	Recruitment agency affirms a position on jobseeker	Recruitment agency affirms a position on recruitment agency

Table 19: Matrix of Relationships between Objects of Concern in Affirming a Position

As observed in Chapters 4 and 5, types of positions are physical, cyber or psychological. The job *object of concern* has a position on information technology affirmed through the efforts of job provider(s). The job's existence on information technology allows person-like objects of concern to affirm their position on job provider(s) and jobseeker(s). The job provider affirms positions on information technology, job provider (itself) and jobseeker(s) by giving indications that it was active and holding its status as a job provider and this means continuously providing jobs or indicating that it can provide jobs (see Table 19).

6.5 Summary of the Chapter

The chapter showed the derivation of theoretical codes relating categories in the grounded theory (*pursuing fit*). An overview of *pursuing fit* was presented first and then the details of relations between categories of *pursuing fit*. Thus, this chapter related to the transliterated memos written during the coding process and used resultant theoretical codes to relate categories in *pursuing fit*. The chapter ends with the summary to the chapter. In accordance with GTM the next chapter integrates pursuing fit with theories in extant literature.

CHAPTER 7: INTEGRATING PURSUING FIT WITH THEORIES IN EXTANT LITERATURE

7.1 Introduction

The main purpose of a literature review after the development of a grounded theory is to integrate the grounded theory with extant literature (Glaser, 1998, p. 77; McCallin, 2006, p. 18; Urquhart, Lehmann, & Myers, 2010, p. 369). This can be achieved by performing a comparative analysis of theories in extant literature with the grounded theory (Glaser, 1998). Thus grounded theory can organise many disparate parts in an area (Glaser, 1998).

This chapter seeks and discusses theories in literature in the wake of *pursuing fit*. It discusses theories that corroborate with *pursuing fit* in filling the same gap in knowledge as *pursuing fit* (I referred to such theories as corroborating theories). The chapter discusses theories that interface *pursuing fit* with extant literature. By 'theories that interface' I mean theories which exhibit points of contact or communication with *pursuing fit*, allowing *pursuing fit* to make sense in the broader knowledge space and be part of a sensible knowledge network.

The chapter has the following sections: Overview of Theories of Fit/Match, Procedures for Identifying Relevant Theories from Extent Literature, Inference to the Best Explanation (IBE), Results of Integrating Pursuing Fit with Theories in Extant Literature, and Summary of the Chapter.

7.2 Overview of Theories of Fit/Match

There are a number of theories of fit/match in extant literature but notable ones in relation to integrating *pursuing fit* with extant body of knowledge are *pursuit-evasion* theories, *matching theory* and *task-information technology fit*. The conclusion that *pursuit-evasion* theory, *matching* theory and *task-information technology fit* help in integrating *pursuing fit* with the extant body of knowledge is based on the meaning of the said theories relative to the meaning of *pursuing fit*.

7.3 Procedure for Identifying Relevant Theories from Extant Literature

I followed two steps to identify relevant theories in extant literature. The first step was to search for relevant literature from the extant body of knowledge (see section 7.3.1). The second step was to determine the relevance of the theories found in the literature search (see section 7.3.2).

Based on the meaning of theories as espoused by their concepts, I searched for theories that corroborate with *pursuing fit* (corroborating theories) and theories interfacing *pursuing fit* with the extant body of theories; the latter were labelled interfacing theories. Corroborating theories are theories that reiterate the meaning of *pursuing fit*; they cover the same knowledge gap as *pursuing fit.* Interfacing theories are theories that have partial corroboration with *pursuing fit*; that is only certain concepts or parts of concepts in corroborating theory mean the same as some concepts in *pursuing fit*. By having partial commonalities with *pursuing fit*, the theory in extant literature provides a link between *pursuing fit* and theories in extant literature, hence the label interfacing theory. My challenge was to have a systematic way of interpreting the meaning of the theories in order to determine whether they were corroborating with *pursuing fit* or interfacing *pursuing fit* with theories in extant literature.

7.3.1 Searching the Literature for Theories on Fit

Since concepts do not have monopolistic relationship with references (Frege, 1948, p. 211), I justifiably used concept labels that are equivalents of those in *pursuing fit* in the search for relevant literature, in addition to the exact labels of concepts used in *pursuing fit*.

Theories' references allow classification of the theories where theories with the same references belong to the same class/grouping. It is through this process that competitor theories to *pursuing fit* and complementary theories to *pursuing fit* emerge.

The search for literature ends with saturation (Boell & Cecez-Kecmanovic, 2014; Combs, Bustamante, & Onwuegbuzie, 2010). The process of literature review reaches saturation when further search does not yield new benefits to the literature review. This can be because the tools or procedures used in the search

and acquisition process are incapable of giving further beneficial literature or there is no beneficial literature available. Literature containing any of the following keywords or phrases in its title was deemed a candidate for selection for the purpose of this chapter: *fit*, *match*, *pursuing fit* and *pursuing match*.

7.3.2 Checking for Relevance of Literature and Theories

Accurate checks for relevance depend on interpretation of signs and symbols in theories, since theories are universal statements represented by "…systems of signs and symbols" (Popper, 2005, p. 37). Researchers and other stakeholders of a theory interpret theories by interpreting concepts, which are groupings of signs and symbols that form the theory. One of the fields most concerned about interpretation is the field of law, and in this field Barnett (2011) defines meaning of text as knowledge which results from interpretation of the text. Although Barnett, (2011) wrote of the meaning of 'text', replacing it with 'concept' is valid as 'text' is simply a written representation of a concept or concepts. Bagozzi (2011) points out that theoretical meaning is contained in the specification of the interpretation (conceptualization) of a main concept, and the relationships that exist between the concept and other concepts in a theoretical network (Bagozzi, 2011, p. 263). Therefore, it was important for me to clarify how interpretation of concepts for meaning took place.

Lewis (1946, p. 39) examines the meaning of a 'term', which I interpreted as sufficient to be the equivalent of examining the meaning of a 'concept'. I consider 'term' and 'concept' to be equivalent because 'term' is a word or expression used to represent a particular thing. A 'thing' is a concept; hence, a 'term' represents a 'concept'. Therefore, Lewis explains a concept's four modes of meaning (Lewis, 1946, p. 49) as:

1. Denotation – is a class of things for which the concept is true. Hence in this view, 'reference' and 'denotation' are two concepts true of the same idea. Denotation refers to things that actually exist, leaving out those things that do not exist although those things would be referential to the concept. As an example, 'position' in pursuit-evasion theories refers to a location in physical

space (which is three-dimensional) whereas 'position' in *Pursuing Fit* extends beyond the physical space to include cyber-position, which is in cyberspace. This reflects an extension of the reference domain of 'position' when considered in the substantive theory of *Pursuing Fit*, which indicates that although the theories share the same concept that concept is not true to the same denotation in both theories.

2. Comprehension – is a classification of all possible or consistently thinkable things to which the concept would be correctly applicable. Thinkable things are imaginable things whose assertion of existence would not cause contradiction. Lewis goes on to say that the denotation of a concept exists in its comprehension but the converse relation is not true (Lewis, 1946, p. 41). In view of this perspective on the meaning of 'concept', the substantive theory of *pursuing fit* falls under the denotation mode of meaning and formal theories in extant literature fall under comprehension mode of meaning.

3. Signification – of a concept is that property in things (denotation or comprehension), the presence of which indicates that the concept correctly applies, and the absence of which indicates that it does not apply (Lewis, 1946).

4. Intension – of a concept identifies with the conjunction of all other concepts each of which must be applicable to anything (denotation or comprehension) to which the given concept would be correctly applicable (Lewis, 1946).

Fine (1975) in discussing how consumers of theories should compare theories stated: "Very roughly the old philosophy of science suggests that I do so by making logical or evidential comparisons in a vocabulary shared by both theories. The new philosophy of science contends that although there may be terms shared by different theories, the concepts marked by these terms (in important or typical cases) will have changed so radically in the move from one theory to another as to preclude the use of ordinary logical or evidential tools" (p. 18). Fine went on to exemplify this by considering the nature of mass in

Newtonian mechanics theory and the nature of mass in Einstein's quantum mechanics theory wherein mass is constant and mass is not constant respectively. In order to explain this shift of meaning from theory to theory, the frame of reference should be the meaning of the theory which is constituted of concepts and reference (Frege, 1948). In short, meaning is constituted as follows:

Meaning = (Concept, reference),

where 'meaning' stands for a common understanding of the theory between scholars, practitioners and other consumers of the theory. 'reference' is what the concept is true of (Fine, 1975, pp. 18–19). Frege pointed out that, "…to a given referent (an object), there does not belong only a single sign." (Frege, 1948, p. 211), and I note 'sign' as a "name, combination of words, letter" (Frege, 1948, p. 210) which according to Fine represents concept (Fine, 1975). GTM literature defines 'concept' as a general or abstract idea inferred or derived from 'indicators' in data (Glaser, 1998). Those 'indicators' are what the concept is true of and hence they are the 'references' or more precisely 'denotations' of the concept. By using 'reference', in this form henceforth there is no loss of articulation of the argument presented in this chapter.

Checking for relevance in a way described above, I reasoned that in cases where labels of concepts in *pursuing fit* matched labels of concepts in theories in extant literature, two possible relationships between *pursuing fit* and the concerned theory in extant literature were possible; either corroboratory or interfacing as briefly stated at the beginning of this chapter.

7.3.2.1 Corroborating Theories

Guided by the above argument, I classified theoretical concepts (concepts of theories) in extant literature according to whether they meant the same (had the same references) as similarly labelled concepts in *pursuing fit*. Therefore, adding on to the definition of corroboration given earlier, if theoretical concepts in extant literature meant the same (shared the full set of references) as concepts in *pursuing fit* then the two sets of concepts were in semantic corroboration. Figure 67 is a diagrammatic representation of a case

where there was corroboration between *pursuing fit* and a theory in extant literature. Corroborating theories share the same set of theories with the same referents.

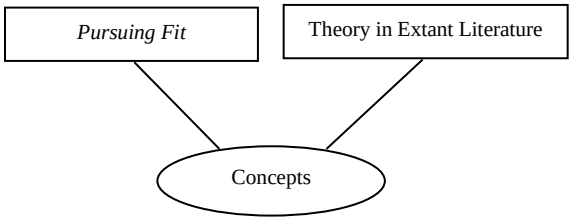


Figure 67: Corroborating theories

Although I did not find corroborating theories from searching extant literature, there were a number of theories interfacing with *pursuing fit* found in extant literature.

7.3.2.2 Interfacing Theories and Literature

Concepts in *pursuing fit* do not necessarily capture the same meaning as captured by concepts deemed commensurate (through label or otherwise) in different theories in extant literature. However, there are areas of coincidence of meaning in different studies. Figure 68 diagrammatically illustrates the idea of interfacing between theories, where a proper subset of the concepts of the respective theories is shared. The shared concepts must have the same references or they must be true of the same thing(s).

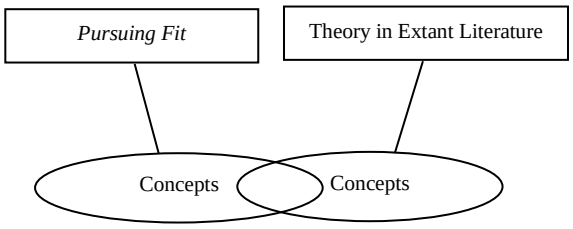


Figure 68: Interfacing Theories

Figure 69 gives a closer picture of the meaning of interfacing by representing concepts using ovals PC and EC intersecting at IC. The oval marked PC represents the set of all concepts of *pursuing fit* and the oval marked EC (extant concept) represents the set of all concepts of extant theory.

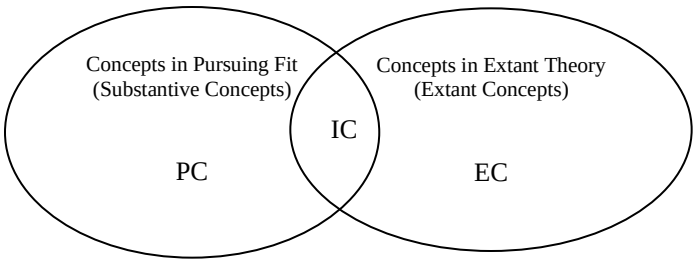


Figure 69: Interfacing at Concept Level

The area marked IC in Figure 69 represents the set of concepts common to both PC and EC, therefore IC forms the interface between the two theories at conceptual level. Figure 70 captures a situation where concepts in IC do not have exactly the same references.

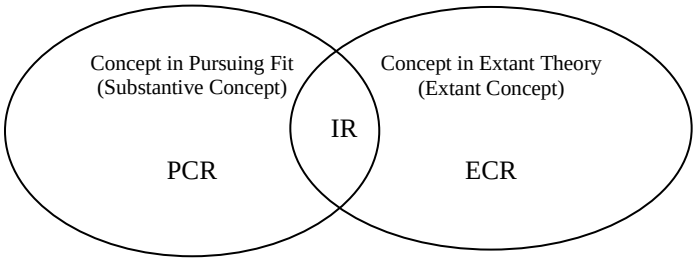


Figure 70: Interfacing at Conceptual Reference Level

Figure 70 gives a set of references for a concept of the substantive theory represented by the oval PCR and a set of references for a concept of a theory in extant literature, represented by the oval ECR. The area marked IR represents the set of references (things that a concept is true of) common to both PCR and ECR. Therefore, IR is a set of interfacing references that links PCR to ECR and hence extant literature.

7.3.2.3 Relevant Theories found in Extant Literature

Using the procedure for searching and checking for relevant literature described earlier, the search for and selection of theories related to *pursuing fit* resulted in the *task-technology fit* (Goodhue & Thompson, 1995) theory emerging as relevant for the integration of *pursuing fit* with the extant body of theories in literature. The search for and analysis of theories in extant literature also resulted in finding and selection of theories of *pursuit-evasion* (Chung, Hollinger, & Isler, 2011; Isler, Kannan, & Khanna, 2005; Parsons,

1978; Ryll-Nardzewski, 1962; Shima & Shinar, 2002; Vidal, Shakernia, Kim, Shim, & Sastry, 2002). The labels of both *pursuing fit* and *pursuit-evasion* share the root word 'pursue' therefore it was natural for *pursuit-evasion* theories to emerge when the search term 'pursue' was used to search for relevant theories. The words 'fit' in *pursuing fit* and the word 'match' are closely related and it was natural for *matching theory* (Abdulkadiroğlu, Pathak, & Roth, 2005; Crawford & Knoer, 1981; Kelso Jr & Crawford, 1982; McCall, 1990; Mortensen, 1988; Niederle & Roth, 2005; Roth & Vate, 1990) to emerge during the search.

Having identified relevant theories, it is necessary to be able to determine which of them better explains the phenomenon of e-recruitment. And to do that, the logic of Inference to the Best Explanation (IBE) is used.

7.4 Inference to the Best Explanation (IBE)

In integrating pursuing fit with theories in extant literature it is sensible to reveal why it is a logical explanation of the phenomenon and Millson & Straβer (2019) notes that IBE informs on which theory best represents a given data set based on its competitiveness in explaining the data set when compared to its alternatives. IBE provides shared standards for adequate explanation against which theories can be measured for efficacy and the theory with the best measure is considered the best explanation (Clayton, 1997).

IBE is not without challenges, as Millson & Straβer (2019) note that some of its accounts in philosophy of science are imprecise and exhibition of illogical properties e.g. contradiction-intolerance. The other challenge is the opinion that best explanations are partially influenced by contextual factors (Day & Kincaid, 1994) making it difficult to have a universal definition of standards for adequate explanation. However, these challenges are surmountable (Millson & Straβer, 2019).

Lipton (2004) and Harman (1965, 1968) note three conditions for a theory T to explain a phenomenon R, and these are: causation, inference and plausibility. Under causation they note that T makes the claim that

R is caused by something known or unknown. Both consider inference by claiming that it should be possible to infer T from R, that is R should have a high probability given T relative to background knowledge K. Informed by the discussion in this section it is essential to consider possible alternatives to pursuing fit, if any, and investigate their suitability to explaining the phenomenon of e-recruitment as manifested by the behaviours and perspectives of stakeholders (see section 7.5).

7.5 Results of Integrating Pursuing Fit with Theories in Extant Literature

All three theories that are relevant to integrating *pursuing fit* with the extant body of theories have interfacing relationship with *pursuing fit*. A subset of concepts in *task-technology fit* (TTF) theory relates to a subset of concepts in *pursuing fit,* hence the determination that TTF theory has an interfacing relationship with *pursuing fit*. The same is true for *pursuit-evasion* theories; however, *pursuing fit* subsumes most concepts in *matching theory*. Table 20 shows theories found in extant literature together with the relationships between the theories and *pursuing fit*. Table 20 also gives samples of literature for each theory found relevant to integrating *pursuing fit* with the extant body of theories.

Theory in Extant Literature which Compete or Complement *Pursuing Fit*	**Relationship of the Theory in Extant Literature to *Pursuing Fit***	**Sample of Relevant Publication(s)**
Task-Technology Fit	Interfacing	Goodhue ,(1988); Goodhue and Thompson, (1995); Goodhue and Thompson, (1998); Zigurs and Buckland, (1998)
Pursuit-Evasion	Interfacing	Boccara et al., (1994); Chung et al., (2011); Isler et al., (2005); Mycielski, (Mycielski, 1989); Parsons, (1978); Ryll-Nardzewski, (1962); Vidal et al., (2002).
Matching Theory (In general)	Interfacing	Abdulkadiroğlu et al., (2005); Abdulkadiroğlu et al., (2009); Crawford & Knoer, (1981); Milgrom, (2005); Mortensen, (1982, 1988); Roth, (1986); Roth & Sotomayor, (1992); Roth & Vate, (1990); Serrano, (2013).
Matching Theory (In recruitment)	Interfacing	Alba-Ramirez, (1993); Allgood & Farrell, (2003); Barro, (1988); Barron et al., (1989); Belfield & Harris, (2002); Heijke et al., (2003); Jovanovic, (1979, 1984); McCall, (1990); Miller, (1984); Mortensen & Pissarides, (1999); Moscarini, (2005); Robst, (1995); Simon & Warner, (1992).
Typology of Fit	Interfacing	Strong & Volkoff, (2010)

Table 20: Theories in Extant Literature and their Relationships to Pursuing Fit

Table 20 splits sample literature for matching theory because *matching theory* is dealt with in many areas, so Table 20 captures that where it gives a sample of literature on *matching theory* from areas other than

recruitment before narrowing down to literature on *matching theory* in recruitment. Therefore, *matching theory* interfaces *pursuing fit* with the extant body of theories within recruitment and outside recruitment.

7.5.1 Typology of Fit

There are many types of fit; Strong & Volkoff (2010) detailed two types of fit (fit as coverage and fit as enablement) in their consideration of fit between an organization and enterprise system. When information technology matches a catalogue of needs of an organization or individual and when information technology results in enablement then there is fit (Strong & Volkoff, 2010, p. 748). In strategic management research "...fit as moderation, fit as mediation, fit as matching, fit as gestalts, fit as profile deviation, and fit as covariation" have been articulated (Venkatraman, 1989, p. 423). Hoehle (2011) in a review of IS research and reference disciplines in addition identify "fit directly assessed" as another conceptualisation.

Furtmueller (2012, p. 62) observed types of fit in recruitment literature and labelled them as follows: objective fit, applicant fit, applicant pool fit. Examples of codes that built these latter typological concepts are: Objective Person-Organization fit, Subjective Person-Organization fit, Objective fit, applicant pool fit and fit feedback (Furtmueller, 2012, p. 62). These are all accommodated in *pursuing fit*.

Although *pursuing fit* does not focus on deriving types of fit, it views fit as enablement (Strong & Volkoff, 2010) and fit as matching (Venkatraman, 1989) as is attested by derivations of categories in Chapters 4 and 5 and the analysis of relationships in Chapter 6. Other theories on fit such as Task-technology Fit model (TTF) have their own adaptations of fit.

7.5.2 Task-technology Fit Model (TTF) and Pursuing Fit

The *task-technology fit* (TTF) model asserts that information technology must have features that fit the needs of the task to be performed (Goodhue & Thompson, 1995). The reason for concern about fit between information technology and tasks is that such a fit or lack of it has influence on performance in

the execution of the task (Goodhue & Thompson, 1995). Figure 71 shows links between task attributes, information technology attributes, TTF, precursors of utilisation, utilisation and performance impacts.

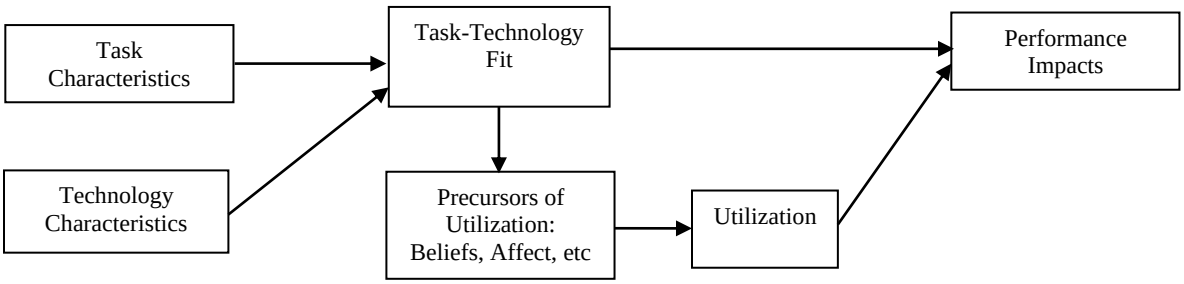


Figure 71: Task-Technology Fit (Goodhue & Thompson, (1995))

One perspective to the relationship between task attributes, information technology attributes and performance on the task is that, when attributes of the task and those of the information technology fit, they enhance performance of the task. There is another perspective, which views the fit between task attributes and information technology attributes as having influence on beliefs, etc. and affecting utilization of the information technology in the execution of a task; only then can performance impacts be realized (Goodhue & Thompson, 1995). Task attributes and information technology attributes mismatch sometimes occurs, resulting in undesirable performance of the task.

Many studies have detailed the need for software evolution (Back, Hammel, & Schwefel, 1997; Goltz et al., 2014; Jarke & Lyytinen, 2015). Other studies have focussed on maintenance of information technology in order to continue meeting requirements imposed by targeted tasks (Chapin, 2000; Chapin, Hale, Khan, Ramil, & Tan, 2001; Kitchenham et al., 1999; Sommerville, 1996). There is a need for software systems that adapt to changing functional requirements and quality requirements, both of which define the task(s) to be performed by the software system (Goltz et al., 2014). There is the changing nature of tasks which software systems have to adapt to, and some are unable to automatically adapt to, leading to low task-technology fit with time (Goltz et al., 2014). There is a need for software/hardware systems that co-evolve with the environment by carrying knowledge that allows them to follow developments in their environment and adapt accordingly (Goltz et al., 2014). *Pursuing fit* contributes to

understanding how such software/hardware systems could be developed in e-recruitment, because it lays bare the processes that take place when *pursuing fit*.

Many substantive areas involve the adjustment of multiple interconnected software systems and components and improving their 'fit' to the environment by adapting them to technical, social, and organizational subsystems (Jarke & Lyytinen, 2015). *Pursuing fit* gives details beyond the adjustments of software systems and components (see Chapters 4, 5 and 6).

Utilization of a system that has low TTF will not improve performance although utilization of such systems may be extensive due to social factors, ignorance, availability of the information technology, and so on (Goodhue & Thompson, 1995). This is the case even when utilization is voluntary (Goodhue & Thompson, 1995). The concept of 'fit' as defined in TTF and *pursuing fit* has the same reference, which means fitting entities have to optimally (if not ideally) complement each other to attain a desired result (state, performance, utilization, etc).

7.5.3 Pursuit-Evasion Theories and Pursuing Fit

Pursuit-evasion theories all come with a pursuer or pursuers with the goal to capture evaders whose goal is to avoid capture (Boccara et al., 1994; Chung et al., 2011; Isler et al., 2005; Mycielski, 1989). *Pursuing fit* and *pursuit-evasion* theories share the conceptual label whose root is 'pursue' and the reference of the word 'pursue' in both cases is to go after ('tracking' as labelled in *pursuing fit*). Positioning is another shared concept between *pursuing fit* and *pursuit-evasion* theories. However, there are differences in references of concepts of *pursuing fit* and references of concepts of *pursuit-evasion* theories. Many *pursuit-evasion* theories are applicable in geographic spaces (Boccara et al., 1994; Chung et al., 2011; Parsons, 1978; Shima & Shinar, 2002; Vidal et al., 2002) and their concept of position is restricted to physical positions whereas the concept of positioning in *pursuing fit* adds reference to psychological positions in addition to physical and cyber positions.

Pursuit-evasion theories have the concept of capture, which *pursuing fit* does not have. Pursuit-evasion

theories are prevalent in gaming studies (Vidal et al., 2002) and unlike *pursuing fit* have the concept of evasion (Isler et al., 2005; Rubinsky & Gutman, 2014). An overview of concepts in pursuit-evasion theories shows that there are variations between the theories because of varying assumptions on the environment, the searchers and the targets (Chung et al., 2011). Chung et al. (2011) noted that search-evasion games in the robotics literature on *pursuit-evasion* were based on:

- The environment or playing space for the game: environments can be plane, grid, graph, polygon, etc.
- Information available to the players (participants): this relates to what the players know about each other's positions or their environment.
- Movement of the players (participants): Chung et al., (2011) referred to aspects related to movement of the player as controllability and these aspects relate to the speed of the players and the players' ability to define direction of their motion.
- Meaning of capture: Implies the end of evasion (temporarily or permanently for the captured player). The pursuer seeing the evader, or the distance between pursuer and evader being less than a threshold distance can signal capture, or pursuers have to surround the evader.

Chung et al. (2011) identified differential and combinatorial as two approaches used in robotics literature to solve pursuit-evasion problems. Both differential and combinatorial are quantitative approaches.

Fomin & Thilikos, (2008) is an annotated bibliography classifying problems and results associated with pursuit-evasion problems in a graphical environment. The study distinguished *pursuit-evasion* problems by search variants wherein there were eleven variants all based on restricting the abilities of either the pursuer or evader or enhancing the abilities of the pursuer or evader (Fomin & Thilikos, 2008).

7.5.4 Matching Theories and Pursuing Fit

Matching theory gives a framework, which describes the formation of symbiotic relationships between searchers over time (Diamond, 1982; Gale & Shapley, 1962; Mortensen, 1982, 1988; Mortensen & Pissarides, 1994, 1999). Mortensen (1988) divided *matching theory* literature into two branches: pure theory of matching, and modelling the dynamics of the outcome of the matching process. Literature on pure theory of matching focuses on finding ways (searching) to a state where the collection of matched (fitting with each other) and unmatched searchers are stable, in that no matched or unmatched searchers have motivation to change their state (Mortensen, 1988) of being matched or not being matched. In modelling the dynamics of the matching process, "…labour economists have become interested in the implications of matching models for empirical phenomena related to job-worker separation behaviour and the growth of individual earnings over the life cycle." (Mortensen, 1988, p. 216). Therefore, concepts in *matching theory* have two core concepts, namely searching and matching, as the explanation given above details. On the other hand, *pursuing fit* has concepts shown in Figure 63.

The concept of 'matching' in matching theory is equivalent to the concept of *interpreting fit* in *pursuing fit*. 'Matching' in *matching theory* is a process of determining compatibility between searchers (Mortensen, 1988; Roth, 1986). Similarly, *interpreting fit* is the process of determining compatibility between objects of concern. 'Searching' in matching theory is equivalent by reference (what it is true of) to *tracking objects of concern* in *pursuing fit* as indicated in the descriptions of the two concepts. However, differences in references between *matching theory* and *pursuing fit* exist. The matching process determines the existence of matches, mismatches, or unstable matches, and the process is not designed to turn mismatching entities into matching ones, a process which *pursuing fit* explains.

A match occurs when searchers form an alliance based on the fact that such an alliance results in mutual benefits to the searchers involved (Mortensen, 1988), or compatibility between the searchers (Roth, Sönmez, & Ünver, 2005). Literature shows that searchers come in a variety of forms. Mortensen, (1988) focused on the state of how job-worker and husband-wife relationships form. Roth et al. (2005) outlined

the potential gains from kidney exchange, and constraints to matching donors to recipients of kidneys, and then presented a design and implementation of a matching mechanism for the case of donors and recipients of kidneys in New England. Abdulkadiroglu et al. (2005) aimed to design a mechanism for matching students to schools given a number of constraints, including the student's ordered choices of schools, schools' preferences for students who put them as first choice, distance to the school from student's residence, whether the student's sibling was at the chosen school, etc. In the cited studies a mismatch in *matching theory* occurs if a searcher cannot find suitable searchers to form alliances with (Abdulkadiroğlu et al., 2005; Mortensen, 1988; Roth et al., 2005). In the above studies a mismatch occurs when a student does not match with any school (Abdulkadiroğlu et al., 2005), or if an individual cannot find a marriage partner, or a candidate does not meet the requirements of any available job (Mortensen, 1988), or when a kidney donor is not compatible with any of the intended recipients (Roth et al., 2005).

Searchers rarely know the value of any match in advance, which makes it possible for matches that start stable to become unstable due to changes of circumstances (Mortensen, 1988). An unstable match occurs when part of the participants in an alliance are not satisfied with the matching and considering leave the alliance (Mortensen, 1988). In some cases, a match can become a mismatch when circumstances change. *Matching theory* has the capacity to indicate the state of matches and *pursuing fit* explains how searchers adjust in pursuit of conformity with each other.

7.5.5 IBE and Integration of Pursuing Fit with Theories in Extant Literature

As alluded to earlier in the chapter, IBE posits that causation, inference and plausibility are the three conditions for a theory to explain a phenomenon. Based on these conditions this section discusses the extent to which the conditions are met by the theories found in literature relative to how lack of fit (the main concern of study stakeholders) is resolved. The discussion examines TTF, pursuit-evasion theories and matching theories against the said conditions in view of the main concern (lack of fit) and its resolution. Table 21 presents an assessment of the explanatory power of the theories for the phenomenon.

	Causation	Inference	Plausibility
Task-Technology Fit	TTF focuses on how fit leads to performance, and not on the causal explanation of how stakeholders' concern about lack of fit is resolved	It cannot be inferred from TTF how the main concern about lack of fit is resolved.	TTF would not be plausible as an explanation for how the main concern about lack of fit is resolved. Emergent aspects of technology are not considered.
Pursuit-Evasion Theories	Pursuit-Evasion theories do not offer a causal explanation of how stakeholders' concern about lack of fit is resolved.	While the pursued in pursuit-evasion theories consciously and actively seek to avoid the pursuers, in e-recruitment the elements seek to find one another without conscious effort and avoidance. Thus a theory where some elements are conscious and active evaders cannot be fully inferred for e-recruitment phenomena.	The behaviour of elements accommodated under pursuit-evasion theories diverges from that of elements in e-recruitment, hence it is not a plausible explanation for e-recruitment phenomena.
Matching Theories	Matching theories offer only a partial explanation of how stakeholders' concern about lack of fit is resolved.	While matching is a part of e-recruitment, it is not overarching and hence it canot be inferred from matching theory how the main concern about lack of fit is resolved.	Again by not considering the whole phenomenon of e-recruitment, matching theories fall short as plausible to explain how the main concern about lack of fit is resolved

Table 21: IBE Assessment of Explanatory Power of Extant Theories

The grounded theory of Pursuing Fit accommodates aspects of the relations between task and technology, pursuit and matching that are separately addressed by the three theories in Table 21. Pertinently it more directly addresses the stakeholders' main concern about lack of fit and therefore offers a more plausible explanation.

7.6 Summary of the Chapter

The chapter has the following sections: Overview of Theories of Fit/Match, Procedures for Identifying Relevant Theories from Extent Literature, Inference to the Best Explanation (IBE), Results of Integrating Pursuing Fit with Theories in Extant Literature, and Summary of the Chapter. The following chapter relates to the evaluation of the study and of *pursuing fit.*

CHAPTER 8: REFLECTIONS AND EVALUATION OF THE STUDY

8.1 Introduction

This chapter is divided into the following parts: Debate on IS research, Reflection on Conceptualisation of E-recruitment in View of *Pursuing Fit*, Checking if Objectives of the Research were Met, Evaluating Quality of the GTM Process, Evaluating GTM Process Applied in this Study, Evaluating *Pursuing Fit*: A Checklist, Reflections on Context in which *Pursuing Fit* Occurs, and Summary of the Chapter. Regardless of how the reader of this thesis relates to GTM, this thesis and this chapter in particular should affirm the pro-GTM reader's confidence in GTM and hopefully abate or rebuff the critic's scepticism.

8.2 Debate on Evaluation of IS Research

Researchers and stakeholders in information systems (IS) determine if research belongs to IS as part of evaluation because the identity of the discipline of information systems (IS) is strengthened through selection of relevant research (Benbasat & Zmud, 2003). While it is essential for IS researchers to focus on the IT artefact "The IS discipline involves much more, however, than the study of the IT artefact. Specifically, IS scholars and IS practitioners strive to increase their collective understandings of (1) how IT artefacts are conceived, constructed, and implemented, (2) how IT artefacts are used, supported, and evolved, and (3) how IT artefacts impact (and are impacted by) the contexts in which they are embedded." (Benbasat & Zmud, 2003, p. 186). This research touches aspects of all three of these areas that practitioners strive to understand.

"…following Benbasat and Zmud's nomological net will result in a micro focus for IS research. The results of such a focus are potentially dangerous for the field. They could result in the elimination of IS from many academic programs. I present an alternative set of heuristics that can be used to assess what lies within the domain of IS scholarship. I argue that the IS community has a powerful story to tell about the transformational impact of information technology." (Agarwal & Lucas Jr., 2005, p. 381). This study

concurs with this latter assertion because it tells the story of information technology coming to aid in everyday activities and having impact on those activities, specifically job-seeking.

The discussion on what constitutes valid IS research goes on (Alter, 2003; McCubbrey, 2003; Myers, 2003; Robey, 2003; Saunders & Wu, 2003). This study focused on the collective of IT artefacts (information technology) relevant to recruitment. I also appreciate the shifting boundaries in information systems, as "Shifting boundaries in the field may be associated with its maturing" (DeSanctis, 2003, p. 261).

8.3 Reflection on Conceptualisations of E-recruitment in View of Pursuing Fit

Pursuing fit espouses the five conceptualisations of e-recruitment identified in the literature review in Chapter 2. These are: *e-recruitment as a technology tool*, *e-recruitment as a system*, *e-recruitment as a process*, *e-recruitment as a service*, and *e-recruitment as a proxy*.

E-recruitment as a technology tool: Espousing of *e-recruitment as a technology tool* is apparent in pursuing fit because information technology features as one of the objects of concern. Without information technology, there is no e-recruitment, however conceptualization of e-recruitment as a technology is not on its own sufficient for recruitment to happen. It is necessary to have other conceptualisations.

E-recruitment as a system: E-recruitment as a system is a conceptualisation accommodated by this study in that a group of interrelated elements in e-recruitment are essential in *pursuing fit*. This is not surprising as *pursuing fit* overarches essential system-elements of e-recruitment. Similarly a set of activities constitute e-recruitment giving justification for it to be conceptualised as a process and pursuing fit captures all these activities because the core category captures how stakeholders resolve their concern. Elements in a system work together to process tasks.

E-recruitment as a process: is reflected in *pursuing fit* when it details the activities that define the process of resolving the main concern. E-recruitment reflects a course of action intended to achieve recruitment which means it is a process. The process takes place with the result that it serves a purpose.

E-recruitment as a service: *Pursuing fit* serves to explain and guide on how the concern about fit is resolved and in doing so captures the conceptualisation of *e-recruitment as a service*. The three conceptualisations that constitute e-recruitment as a service are: *e-recruitment as a repository*, *e-recruitment as a medium*, and *e-recruitment as a program* (e-recruitment as an implemented algorithm). All are captured in *pursuing fit*. They serve the needs of stakeholders for repository, medium, and software programs respectively, hence fitting the needs of stakeholders.

E-recruitment as a proxy: Some of the tasks that used to be performed by humans are now done by electronic means, e.g. delivering applications and filtering applications. This substitution of traditional approaches means e-recruitment becomes a proxy acting for recruitment participants. This conceptualisation is also captured by the theory of *pursuing fit*.

8.4 Checking if the Objectives of the Research were Met

This section echoes research objectives presented in Chapter 1 and identifies where in the presentation of the research the objectives were addressed.

1. The first objective was to identify the main concern and sub-concerns of recruitment agencies and jobseekers in e-recruitment in Namibia. Chapters 4, 5 and 6 resulted in the identification of *fit* as the main concern.

2. The second objective was to understand, how concerns are processed and resolved (core variable/ core category) by recruitment agencies and jobseekers. The concerns are resolved by *pursuing fit*, which is detailed in Chapter 6 after the emergence of its categories in Chapters 4 and 5.

8.5 Evaluating Quality of the GTM Process

High quality GTM studies fit the data, work in the studied substantive area, are relevant for the study and allow for modifications to be made to the procedures and their outcomes based on data (Glaser, 1978, 1998). Therefore, in this section I explain how I ensured the fit, workability, relevancy and modifiability in this study.

8.5.1 Evaluating Fit

Glaser (1978) notes that a concept is said to "fit" if it adequately reflects the data that it purports to express. Therefore, to evaluate fit the reader of this thesis needs to check if the concepts, including categories derived are representative of the data they are meant to represent. This study has stayed close to the data by sticking as much as possible to in vivo concept labels. In checking for fit the reader also needs to check for ungrounded assumptions and data, which Glaser (1978) identified as having potential to derail fit in classical GTM. In evaluating fit, it has to be noted that fitting categories increase and ensure transparency. I have in this study ensured a close link between the data and the categories derived.

8.5.2 Evaluating Workability

Glaser (1998) views workability as how the core variable accounts for the research participants' continual resolution of their main concern. The core variable in this study captures the activities associated with resolving the main concern at every point in the researched participants' behaviours. This is in harmony with ensuring that, as Glaser (1978, 1998, 2011) put it, the emergent GT clearly explains what is happening, and the process of its happening.

8.5.3 Evaluating Relevance

Relevance is determined by members of the constituency of the research from which data was drawn. Since GTM is an iterative process it allowed me to get feedback on the relevance of the categories as they emerged through the research process. Going through the processes detailed in Chapters 4 and Chapters 5 shows the iterative process and how the researched constituency accepted the proceedings and outcomes

of the research. Glaser, (1998) noted that prior to the research it is very likely that respondents would be unable to articulate their main concern, but once they have read the research they should instantly be able to recognize the emerged core variable as being authentic. Many of the respondents did not have time to read through the approximately 300 pages of this research document, I had to orally relate the outcomes as the research proceeded and at the end. Through such interactions they provided further data and their views.

8.5.4 Evaluating Modifiability

Modifiability of a grounded theory Glaser (1998) indicates, is the ease with which subsequent CGTM researchers can proceed to modify or refine the theory as they collect and code new data. Thus by coding data in every way possible without being bound to only the data used in this research it is possible for other researchers to modify or refine the theory as dictated by the data they collect.

8.6 Evaluating GTM Process Applied in this Study

Evaluation of GTM used in research is affected by confusion in the use of the term ‘grounded theory’, as in some cases the term is used to mean the method and in other cases it is used to mean the theory (Bryant, 2002, p. 27; Matavire & Brown, 2013). Confusion is compounded by the misunderstanding of genres of GTM and ways in which the genres are used in IS research (Matavire & Brown, 2013). The confusion has an effect on what the evaluator targets for evaluation purposes. However, a thorough understanding of GTM reveals that evaluation has to be targeted at firstly the principles and procedures of the methodology (GTM) then the result of applying GT (resultant theory).

Urquhart, (2013, p. 181) noted that almost all debate on GTM occurs around how GTM is done, as opposed to the discussion about theories that result from the use of GTM. Both GTM and the resultant grounded theory need evaluation if stakeholders are to trust the research.

8.6.1 Evaluating how GTM was Carried Out

There are various ways in which researchers use GTM in research (Matavire and Brown, 2013), therefore, I described and explained the principles and procedures of GTM clearly, and the principles and procedures need to fit with the circumstances in the research. The quality of GTM is dependent on the suitability and clarity in the description, explanation and application of its principles and procedures (Glaser, 1998).

8.6.2 Evaluating the Write-up of this GTM Study

Writing in GTM studies is a retrospective process (Urquhart, 2013, p. 148, 2013, p. 171) and it is the final stage of GTM, meant to capture the whole process of GTM (Glaser, 1978, p. 128). The researcher needs to write for his/her GTM to reach many stakeholders and make the GT count (Glaser, 1978, p. 128) and there are many approaches to structure documentation of GTM based studies.

The general structure of GTM write-up starts with an introduction, which carries the general problem (Glaser, 1978, p. 131). I derived the general problem and core variable from the GT that resulted from the study. The literature woven into the introductory chapter are mainly supplementary and not sources of derivation of the core category (Glaser, 1978, p. 131). If the chapter is an introduction, then the chapter should end with the outline of the chapters that constitute the write-up (Glaser, 1978, p. 131) and Chapter 1 (Introduction) of this thesis espouses this advice from Glaser (1978). The introduction was followed by a literature review to contextualize the study, before the methodology presentation. However, there is a warning against being too steeped in the literature before analysis (Matavire & Brown, 2013). Therefore I wrote the contextual literature review fully aware of the risks.

In order to manage the expectations of the reader every chapter in this thesis document begins with an outline of the contents of the chapter, which details how the goal(s) of the chapter. Chapters after the introduction end with a transition to the next chapter for the sake of flow in the document.

Recommendation to this approach was provided by Glaser, (1978) who went further to indicate that if the writeup is in the form of a book it ends with a chapter of general conclusions.

Urquhart (2013) advises that researchers need to show coding procedures through examples, because an example will show the readers that the researcher is competent. This was done in Chapters 3, 4, 5 and 6, therefore, on the issue of coding procedure the thesis covers the required aspects in theory and practice.

Integration of the substantive theory with extant literature depends on the nature of the substantive theory at hand (Urquhart, 2013). In cases of integration of the substantive theory with extant literature sometimes tables are used, sometimes diagrams are used (Urquhart, 2013) and sometimes the researcher grapples with the literature (Strauss, 1987). In all cases of presentation, Glaser and Strauss (1967, p. 229) recommend the researcher use several tools. In Chapter 7, I used many devices or tools to integrate pursuing fit with theories in extent literature. The research write-up meets readers and reviewers' expectations by the level of credibility of the methodology used in the study.

8.6.3 Credibility of GTM

In order for the judgement on credibility to be in favour, the audience has to feel that they are part of the journey to the discovery of the theory through intimacy with data, descriptions and explanations in the research document. Therefore, a number of issues were attended to in order to ensure credibility of the GTM used in this study. Firstly I provided and followed clear procedures on data collection and analysis; and secondly, I vividly describe the data in the study so that the audience becomes intimate with the study subjects through the data. I heeded Glaser and Strauss' (1967, p.228) suggestion that bringing intimacy with the data used in the research is helped by using data as evidence for conclusions thereby indicating how the theory emerged. Also, I used codified procedures to show how the transition from data to theory took place. Thirdly, I strived for clear explanation of the theory so that the audience understands it (see Glaser and Strauss, 1967, p. 228).

The credibility of GTM is earned through explication of the rationale in applying each and every procedure of GTM (Glaser & Strauss, 1967, p. 223). Credibility of GTM is enhanced by the very close relationship between GTM procedures, data and the concepts that emerge from using GTM procedures in the analysis (Glaser, 1998). This thesis document carries the reader through procedures applied in the study (see Chapters 3, 4, 5, 6, 7 and 8) in an attempt to make the reader feel close to the execution of the procedures and trust in the way I executed them. I applied, described, explained and grappled with GTM procedures (see Chapters 3, 4, 5, 6, 7 and 8) in an attempt to make the reader understand and trust the application of GTM in the study.

8.7 Evaluating Pursuing Fit: A Checklist

The checklist for the process of evaluating the substantive theory of *pursuing fit* starts with a discussion on the definition of the term 'theory'. The section discusses the meaning of theory in general, in GTM literature and in information systems. The definition of theory in information systems provides bases for checking if *pursuing fit* fits the label 'theory'. The section then gives consideration to the credibility of *pursuing fit* as theory.

8.7.1 Pursuing Fit and the Meaning of Theory

The word 'theory' might become meaningless due to the diversity of its referents (Merton, 1967, p. 39). Freese, (1980, p. 189) says, "What counts as formal sociological theory is very much in the eye of the beholder." and Feldman, (2004, p. 565) also states "Let us be clear: theory is often in the eye of the beholder." Sometimes there is a conflict in what is called theory (Freese, 1980, p. 188) because "Differences in views of theory depend to some degree on philosophical and disciplinary orientations, yet there are also commonalities." (Gregor, 2006, p. 614). Definitions of theory espoused in interdisciplinary fields like information systems reflect these commonalities. Therefore, it makes sense to use the definition of theory in information systems as a basis for checking if *pursuing fit* is a theory.

"Nothing is quite so practical as a good theory" (Ven, 1989), a view which is echosed in another paper titled "Nothing as practical as a good theory" (Pawson, 2003). Thus, a good theory has to have implications on the subject discipline or field. *Pursuing fit* implies that e-recruitment demands adaptable recruitment stakeholders, otherwise the information technology used may be unsuitable and of little or no benefit to the dynamic recruitment process and its stakeholders.

This research underscores information technology as a tool used in performing tasks in recruitment. Recruitment information and activities have always been able to share space with other things, like news in newspapers and chitchat in informal conversations. The noise of the Internet, however, brings another level of demands, which reinforces the need to pursue the right information technology and other *objects of concern*. Random use of information technology will not guarantee favourable results, but meticulous selection and use of information technology increases the chance of favourable results (See Chapters 5 and 6). However, it is one thing to postulate the research's practical implications and another to see the implications playing out in practice.

8.7.1.1 General Meaning of Theory

It is difficult to get a clear understanding of the meaning of the term 'theory' in traditional research disciplines and it is even more difficult in a multi-disciplinary field like information systems, where stakeholders come from varied disciplines and have a variety of notions about the meaning of the word 'theory'. I discuss the meaning of theory in general, the meaning of grounded theory (GT) that results from the use of GTM and the meaning of theory in information systems. The meaning of theory in information systems captures espoused meanings of theory in many disciplines and that is expected, because information systems is interdisciplinary.

Many studies define theory (Charmaz, 2006; Corley & Gioia, 2011; Feldman, 2004; Freese, 1980; Glaser, 1998; Gregor, 2006; Merton, 1967; Peters, 2014; Ven, 1989; Weick, 1989; Whetten, 1989) and consider the essential elements of a theoretical contribution be explicit treatments of who, what, where, when, why,

and how - and the greatest of these is why (Whetten, 1989). Table 22 summarises the essential elements of a theory as presented by Whetten, (1989). This research document shows recognition of elements in Table 22 from chapter to chapter.

Element	Description	Criteria for Evaluation
What?	Solicits for the exposition of factors that need to be considered as part of the explanation of the phenomenon of interest.	Comprehensiveness (to see if all relevant factors were considered). Parsimony (Redundant factors need to be removed).
How?	Solicits for the relationships between the identified factors. Sometimes arrows and other connectors are used between representations of factors.	There may be testing methodological inadequacies but that does not invalidate the relationships.
Why?	Solicits for justification of the selection of factors and their relationships. Sometimes this requires assumptions on which the theory is based to be presented.	The logic underlying the model must be sound to the reader. The logic is usually based on the assumptions presented.
Who? **Where?** **When?**	These set the boundaries of the theory. Who and when solicit for contextual boundaries and when solicits for temporal boundaries.	Contextual and temporal sensitivity with regards to the theory.

Table 22: Essential Elements of a Theory (Whetten, 1989)

8.7.1.2 Meaning of Theory in GTM Studies

Much literature (Corley, 2015; Urquhart, Lehmann, & Myers, 2010) considers the definition of grounded theory. Framing the evaluation within the definition of GT gives a measure of how much of the results of the study using GTM stakeholders can call GT.

Urquhart et al. (2010), in determining the scope of theory resulting from studies that use GTM, distinguish three levels of theory, which are: seed concepts, substantive theories and formal theories. Of the three levels, Urquhart et al. (2010) observe that substantive theories are in the majority in the studies they considered.

Seed concepts are conceptual ideations that allow the initialization of GTM (Glaser & Strauss, 1967, p. 6; Urquhart et al., 2010, p. 362). Seed concepts help the researcher select an area of investigation and define the topic (Urquhart et al., 2010) but have very limited range and scope in the theory building process.

On the other hand substantive theory is "an intensive explanation of the details of action within a specific area" (Glaser, 2007, p. 82). Substantive theories have validity in a specific area but they are independent of data analysed and are of relevance beyond incidents observed (Glaser, 1978, p. 78, 1998; Glaser and Strauss, 1967). Independence of the substantive theory from the data analysed means that substantive theories are sufficient within a substantive area and do not confine their meaning only to data used in their development. Considering *pursuing fit* as presented in earlier chapters of this thesis, there is a strong and convincing argument that *pursuing fit* is a substantive theory.

Further abstraction of concepts in substantive theories results in formal theory (Glaser, 1978, 2007; Glaser and Strauss, 1967). Formal theories give generalisations beyond individual substantive areas (Glaser, 2007, p. 80). Glaser says of formal GT, "It is a written understanding of how a core category applies extensively and inclusively across a range of substantive areas." (Glaser, 2007, p. 82).

8.7.1.3 Theory in Information Systems and Pursuing Fit

The primary goals of theory in information systems are analysis and description, explanation, prediction and prescription (Gregor, 2006, p. 619). Theories whose goal is analysis and description provide the conceptual structure of a phenomenon of interest together with the relationships (borne of analysis) between the concepts (Gregor, 2006, p. 619). Theories whose goal is explanation provide responses to questions of how, why and when in relation to events in a phenomenon of interest (Gregor, 2006, p. 619) and provide insight into the phenomenon. The goal of prediction holds for theories that inform on what will happen if some specific preconditions are met and prescriptive theories give steps that need to be followed if a particular result is to be obtained (Gregor, 2006, p. 619). Table 23 gives the types of theories and their distinguishing attributes together with indication of the types to which *pursuing fit* belongs.

Theory Type	Distinguishing Attributes	Comment on Theory Type's relation with Pursuing Fit
Analysis	Says what is. The theory does not go beyond analysis and description. No causal relationships among phenomena are specified and no predictions are made.	Not a type to which *pursuing fit* belongs because *pursuing fit* goes beyond 'what is'.
Explanation	Says what is, how, why, when, and where. The theory provides explanations but does not aim to predict with any precision. There are no testable propositions.	*Pursuing fit* explains e-recruitment, and how, why, when and where information technology is an aide to recruitment (see Chapter 6).
Prediction	Says what is and what will be. The theory provides predictions and has testable propositions but does not have well-developed justificatory causal explanations.	*Pursuing fit* indicates whether a combination of states of objects of concern will result in fit (see Chapter 6).
Explanation and Prediction	Says what is, how, why, when, where, and what will be. Provides predictions and has both testable propositions and causal explanations.	*Pursuing fit* explains the dynamics between objects of concern and gives predictions of fit as explained earlier in this column.
Design and Action	Says how to do something. The theory gives explicit prescriptions {e.g., methods, techniques, principles of form and function) for constructing an artefact.	*Pursuing fit* provides explanation and prediction but not prescriptions on how e-recruitment should take place.

Table 23: Types of Theories in Information Systems and their Relationships to Pursuing Fit

Gregor (2006) goes further to detail core components that constitute the structure of any theory that include means of representation, constructs, statements of relationships and scope of the theory (Gregor, 2006). Means of representation provide a way in which the presenter of the theory conveys the theory to stakeholders, constructs are concepts of the theory, statements of relationship are statements to relate concepts and the scope of the theory is the space of influence of the theory. Aside from evaluating how *pursuing fit* measures up to the definition of a theory I also consider evaluating the credibility of *pursuing fit*.

8.7.2 Evaluating Credibility of Pursuing Fit

The presentation of the GTM study has an effect on how the reader judges credibility of GT (Glaser and Strauss, 1967, p. 230). According to Glaser and Strauss (1967), judging the credibility of the GT requires the reader to be carried into the substantive area through description of the substantive area and the reader must be taken through the procedures leading to the theory in the most transparent way possible (Glaser and Strauss, 1967, p. 230). The introduction (Chapter 1) to the thesis provides a description of the substantive area and the thesis takes the reader through procedures leading to the theory (see Chapters 3, 4, 5, 6 and 7). Also having multiple comparison groups improves the credibility of the theory (Glaser and Strauss, 1967, p. 231) and in this study I had two groups of participants (jobseekers and recruitment agencies).

Further, "The credibility of a grounded theory should be won by its integration, relevance and workability, not by illustration (example) used as if it were proof." (Glaser, 1978, p. 134). The four criteria relevant in evaluating GT are fit, relevance, workability, and modifiability (Glaser, 1998, pp. 236–237). Theory can arouse trust and truthfulness by, "…its grab, fit, relevance, workability and integration." (Glaser, 2011, p. 61). Therefore, to evaluate *Pursuing Fit* the evaluator needs to consider grab, fit, relevance, workability and integration.

When a theory has 'grab', it means the theory catches/captures the attention of at least its immediate stakeholders (Glaser, 1998). A theory with 'grab' stands out. Each of fit, relevance, workability and integration contribute to a theory's 'grab'.

In GTM language, 'fit' is another word for validity (Glaser, 1998; Glaser and Strauss, 1967). There is no wrong theory (Glaser, 1998, p. 37), but there are theories that cannot be trusted because they do not embody the data, or the phenomenon from which they supposedly emerged (do not 'fit'). The reader observes 'fit' when the data directs the labelling of patterns noted in the data (as shown in Chapters 4,5

and 6), and 'fit' requires that the grounded theory integrate with extant literature (Glaser, 1998) (as done in Chapter 7).

Relevance implies that the concepts that emerge must reflect the true issues of concern to the participants in the substantive area (Glaser, 1998). The substantive theory of *pursuing fit* is closely related to the subject matter of concern (see how in vivo terms influenced the naming of concepts in Chapters 5 and 6).

Workability is a criterion for evaluating GT, and Glaser (1998) said that if the concepts and what is occurring are tightly related then the concepts work. If the core variable accounts for the continuous resolution of the main concern, then the core variable works. The evaluator then has to check the core variable against what is going on in the phenomenon studied to see if the core variable continuously captures what is occurring throughout the phenomenon (Glaser, 1978, 1998). The process of determining the core variable (see Chapters 4, 5, 6 and 7) allowed me to evaluate workability of the core variable.

Modifiability is an attribute associated with grounded theory's openness to modification through the process of constant comparison. According to Glaser (1998, p. 237), "The theory does not force the data, the theory gets modified by it.". Also, if "…all is data." (Glaser, 1978) it means extant literature has the ability to modify the theory (see Chapter 7) because extant literature provides data. The emergence of a theory from its embryonic stage to a fully-fledged substantive theory, which still provides scope for further development, is evidence of modifiability of the theory.

8.8 Reflections on Context in which Pursuing Fit Occurs

The theory of pursuing fit emerged from within the context of Namibia. Three characteristics defining the context were: (1) the geographic dispersion of the Namibian labour force, which makes traditional approaches to recruitment inefficient and/or ineffective; (2) the pervasiveness of mobile information and communication technologies (m-ICTs) that facilitate e-recruitment by recruitment stakeholders, and (3) competition among jobseekers for scarce job opportunities and competition among recruiters for jobseekers with scarce skills. Context did not emerge as a significant variable in the emergent theory. As

Glaser & Holton (2004) assert "context must emerge as a relevant category or as a theoretical code like all other categories in a GT. It cannot be assumed as relevant in advance". Nevertheless, traces of this context were evident in the data, and in the labelling of some emergent concepts. The context of geographic dispersion as an issue was evident in that some jobseekers indicated they moved to urban centres because of the lack of regular access to both Internet services as well as newspapers. Some job-seekers in remote areas would request friends in the city to send details of job-postings in newspapers to them electronically (e.g. via Whatsapp) , as the newspaper deliveries were not always regular in remote areas. The data also confirmed widespread use of mobile technology by job-seekers, and increased use of social media for e-recruitment purposes. The data pointed to the high levels of competition for jobs, as recruitment agencies vetted applications. The concept of "Waving a Placard" was reflective of the context. The label is a result of observing how jobseekers in Namibia stand by roadsides and vicinities of hardware shops waving placards with the jobseekers' skill-set written on them in an attempt to attract passers-by who may have wanted to recruit. At times, jobseekers wave the tools of their trade e.g. paint brushes, joinery tools and so forth. The same concept is adopted online by jobseekers, when they register on job providers' websites and professional websites - they present their skills, experience and other relevant details.

8.9 Summary of the Chapter

This chapter covered the following topics: Debate on IS research, Reflection on Conceptualisation of E-recruitment in View of *Pursuing Fit*, Checking if Objectives of the Research were Met, Evaluating Quality of the GTM Process, Evaluating GTM Process Applied in this Study, Evaluating *Pursuing Fit*: A Checklist and Reflections on Context in which *Pursuing Fit* Occurs.

CHAPTER 9: CONTRIBUTION OF THE STUDY AND FURTHER RESEARCH

9.1 Introduction

This chapter concludes this thesis with An Overview of the Research Study, Contributions of the Research to Knowledge, Further Research, and Summary of the Chapter.

9.2 An Overview of the Study

E-recruitment consists of diverse artefacts and stakeholders that interact in a variety of ways. Stakeholders interpret e-recruitment artefacts in conjunction with other e-recruitment factors, e.g. for jobseekers the interpreted factors includethe job, job provider and jobseeker. For recruitment agencies the interpreted factors include clients of the agency, and candidates for the job.

Problems with e-recruitment and gaps in e-recruitment theory prompted for research in e-recruitment, starting with investigating what happens in e-recruitment. Therefore, the research aimed to develop a substantive theory that captures what happens in e-recruitment. Thus the objectives were to identify the main concern and sub-concerns of jobseekers and recruitment agencies in e-recruitment in Namibia and to understand how the concerns are processed and resolved by jobseekers and recruitment agencies.

This study followed a GTM approach to develop a substantive theory from empirical data. Since this study did not start with predefined concepts it used classic GTM. Using the principle aspects of classic-GTM i.e. theoretical sampling, iterative coding, constant comparison and memoing the study explained the phenomenon of e-recruitment from the integrated perspectives of jobseekers and recruitment agencies. What happens in e-recruitment was captured through discussions with jobseekers and recruitment agencies. The suitability of the resulting theory to practice was evident through its complementary integration with extent theories in IS literature.

9.3 Contributions of the Study to Knowledge

This study uncovered the main concern of jobseekers and recruitment agencies in e-recruitment processes in Namibia. The study further uncovered how the main concern (*fit*) is resolved by *pursuing fit*. The theory of continually resolving the main concern by *pursuing fit* is a theoretical contribution to knowledge because such a theory fits well with the studied phenomenon of e-recruitment.

Chapter 7 discusses integration of *pursuing fit* with the extant body of theories, including task-technology fit (TTF), pursuit-evasion theory and matching theory. *Pursuing fit* relates to TTF in cases of lack of fit between task attributes (e.g. job-seeking) and information technology attributes. *Pursuing fit* through its subcategory *positioning for fit* relates to pursuit-evasion theories. Matching theories relate closely to *interpreting objects of concern*, which is a subcategory of *pursuing fit*. There are constructs beyond the scope of TTF, pursuit-evasion theories and matching theories which are accommodated by *pursuing fit*, through subcategories like *tracking objects of concern*, and *positioning for fit*.

The real strength of the theory is not only that people pursue fit and that they position for fit, but that the theory reveals how this positioning happens and how information technology, its interpretation and its tracking has implications for the multiple dimensions of fit.

9.4 Further Research

This study determined what happens in e-recruitment from the perspectives of jobseekers and recruitment agencies and in so doing raised questions worth researching further.

9.4.1 Considering Perspectives of More Stakeholders

This study considers the perspectives of only two types of stakeholders on e-recruitment A study that considers the perspectives of more than two stakeholders simultaneoulsy would give further insight into e-recruitment. Such a study would include the perspectives of any two or more of jobseekers, employers, recruitment agencies, e-recruitment artifact developers, e-recruitment platform owners and others. One

investigation to consider in such an instance includes finding out whether the main concern remains the same as in this study.

This study focused on Namibia, which has a population of approximately 2 million people and a relatively small economy whose Gross Domestic Product by Teweldemedhin's, (2015) study is at number 139 in the world. An investigation into the same concern in more populous contexts and bigger economies would be beneficial.

9.4.2 Research on E-recruitment in the Face of Emerging Information Technologies

A number of information technologies are emerging and have potential to change the face of e-recruitment. Some of these technologies include: 5th Generation (5G) technology, Edge Computing (EC) and Quantum Computing (QC).

Liu et al., (2017) commented that 5G technology's scope covers the development of a number of wireless communication standards, and such development consequently means technological advancement and social interaction. The specifications of 5G architecture stated by Chen & Kang, (2018) are enhanced mobile broadband, ultra-reliable and low latency communications, and massive machine-type communication, thus 5G is expected to serve beyond only telecommunications to include the whole information society. Given such a scope and architecture specification researchers need to investigate the impact and effect that 5G will have on e-recruitment.

The Edge Computing (EC) paradigm as viewed by Satyanarayanan, (2017) as one that allows for computing and storage resources to be placed close to mobile devices, sensors, end users, Internet of things, etc and not in the Internet at a distance from where they are useful. Satyanarayanan (2017), Ai et al., (2018) and Chang et al., (2019) add that placing these resources at the edge of the Internet close to where they are used improves latency, bandwidth, trust, and survivability. Again, how will this or how is this changing the phenomenon of e-recruitment?

There are concerns that Quantum Computing (QC) will render current encryption algorithms obsolete (Dysart, 2018). Given that stakeholders in e-recruitment are already worried about the security of data they provide online (Yoon Kin Tong, 2009), then what dynamics will QC bring to e-recruitment? How will quantum algorithms fare in e-recruitment? These and other questions need investigation.

I have reflected on what e-recruitment will be like after disruption by each of the above information technologies, but what will be the compound impact or effect of these and other emerging information technologies (e.g. robotics process automation, artificial intelligence, etc.) on e-recruitment? I recommend research to understand the nature of emerging technologies in relation to e-recruitment.

9.4.3 Research on Affordances in E-recruitment

The concept of *"Interpreting Information Technology"* emerged as a key concept in the Pursuing Fit theory. The concept has some resonance with the notion of affordance. An affordance has been defined as "the potential for behaviour associated with achieving an immediate concrete outcome and arising from the relation between an artifact and a goal-oriented actor or actors" (Strong et al., 2014, p. 69 as cited by Fromm et al., 2020). Considering e-recruitment as the artefact, and the job-seeker, job-provider and recruitment agency as actors, research can be conducted to understand the affordances of e-recruitment, how they are realised and with what outcomes.

9.5 Summary of the Chapter

The chapter presented the following: Introduction, An Overview of the Study, Contributions of the Study to Knowledge, Implications of the Study, and Further Research. This chapter indicates in many ways why the study was done.

REFERENCES

Abdulkadiroğlu, A., Pathak, P. A., & Roth, A. E. (2005). The New York City High School Match. *American Economic Review*, *95*(2), 364–367.

Abdulkadiroğlu, A., Pathak, P. A., & Roth, A. E. (2009). Strategy-Proofness Versus Efficiency in Matching With Indifferences: Redesigning the NYC High School Match. *The American Economic Review*, *99*(5), 1954–1978.

Adolph, S., Kruchten, P., & Hall, W. (2012). Reconciling Perspectives: A Grounded Theory of How People Manage the Process of Software Development. *Journal of Systems and Software*, 85(6), 1269-1286.

Agarwal, R., & Lucas Jr., H. C. (2005). The Information Systems Identity Crisis: Focusing on High-Visibility and High-Impact Research. *MIS Quarterly*, *29*(3), 381–398.

Agarwal, R., Sambamurthy, V., & Stair, R. M. (2000). Research Report: The Evolving Relationship Between General and Specific Computer Self- Efficacy—An Empirical Assessment. *Information Systems Research*, *11*(4), 418–430.

Ai, Y., Peng, M., & Zhang, K. (2018). Edge Computing Technologies for Internet of Things: A Primer. *Digital Communications and Networks*, *4*(2), 77–86.

Akbulut, Y., Dönmez, O., & Dursun, Ö. Ö. (2017). Cyberloafing and Social Desirability Bias Among Students and Employees. *Computers in Human Behavior*, *72*, 87–95.

Akerlof, G. (1970). The Market for Lemons. *Quarterly Journal of Economics*, *84*(3), 488–500.

Alba-Ramirez, A. (1993). Mismatch in the Spanish Labor Market: Overeducation? *Journal of Human Resources*, *28*(2), 259–278.

Allden, N., & Harris, L. (2013). Building a Positive Candidate Experience: Towards a Networked Model of E-recruitment. *Journal of Business Strategy*, *34*(5), 36–47.

Allgood, S., & Farrell, K. A. (2003). The Match Between CEO and Firm. *The Journal of Business*, *76*(2), 317–341.

Alter, S. (2003). The IS Core - XI: Sorting Out the Issues About the Core, Scope, and Identity of the IS Field. *Communications of the Association for Information Systems*, *12*(1), 607–628.

Anderson, N. (2003). Applicant and Recruiter Reactions to New Technology in Selection: A Critical Review and Agenda for Future Research. *International Journal of Selection & Assessment*, *11*(2/3), 121–136.

Aris, S. R. S., Janom, N., Arshad, N. H., Salleh, S. S., & Mastuki, N. (2013). A Preliminary Study for Critical Success Factors of Micro Sourcing in Malaysia. *2013 International Conference on Research and Innovation in Information Systems (ICRIIS)*, 22–26. Kuala Lumpur, Malaysia.

Asiedu, E., & Freeman, J. (2009). The Effect of Corruption on Investment Growth: Evidence From Firms in Latin America, Sub-Saharan Africa, and Transition Countries. *Review of Development Economics*, *13*(2), 200–214.

Back, T., Hammel, U., & Schwefel, H. P. (1997). Evolutionary Computation: Comments on the History and Current State. *IEEE Transactions on Evolutionary Computation*, *1*(1), 3–17.

Bagozzi, R. P. (2011). Measurement and Meaning in Information Systems and Organizational Research: Methodological and Philosophical Foundations. *MIS Quarterly*, *35*(2), 261–292.

Barnett, R. E. (2006). Scalia's Infidelity: A Critique of Faint-Hearted Originalism. *University of Cincinati Law Review*, *75*(7), 7–24.

Barnett, R. E. (2011). Interpretation and Construction. *Harvard Journal of Law & Public Policy*, *34*(1), 65–72.

Barro, R. J. (1988). The Persistence of Unemployment. *The American Economic Review*, *78*(2), 32–37.

Barron, J. M., Black, D. A., & Loewenstein, M. A. (1989). Job Matching and On-the-Job Training. *Journal of Labor Economics*, *7*(1), 1–19.

Bartram, D. (2000). Internet Recruitment and Selection: Kissing Frogs to find Princes. *International Journal of Selection and Assessment*, *8*(4), 261–274.

Baskerville, R., & Pries-Heje, J. (1999). Grounded Action Research: A Method for Understanding IT in Practice. *Accounting, Management and Information Technologies*, *9*(1), 1–23.

Bassett, E. H., & O'Riordan, K. (2002). Ethics of Internet Research: Contesting the Human Subjects Research Model. *Ethics and Information Technology*, *4*(3), 233–247.

Becker, H., & Geer, B. (1957). Participant Observation and Interviewing: A Comparison. *Human Organization*, *16*(3), 28–32.

Bélanger, F., & Crossler, R. E. (2011). Privacy in the Digital Age: A Review of Information Privacy Research in Information Systems. *MIS Quarterly*, *35*(4), 1017–1042.

Belfield, C. R., & Harris, R. D. F. (2002). How Well Do Theories of Job Matching Explain Variations in Job Satisfaction Across Education Levels? Evidence for UK Graduates. *Applied Economics*, *34*(5), 535–548.

Benbasat, I., & Zmud, R. W. (2003). The Identity Crisis Within the IS Discipline: Defining and Communicating the Discipline's Core Properties. *MIS Quarterly*, *27*(2), 183–194.

Birks, D. F., Fernandez, W., Levina, N., & Nasirin, S. (2013). Grounded Theory Method in Information Systems Research: Its Nature, Diversity and Opportunities. *European Journal of Information Systems*, *22*(1), 1–8.

Blaauw, D., Louw, H., & Schenck, C. (2006). The Employment History of Day Labourers in South Africa and the Income They Earn-A Case Study of Day Labourers in Pretoria: Economics. *South African Journal of Economic and Management Sciences*, *9*(4), 458–471.

Boccara, N., Roblin, O., & Roger, M. (1994). Automata Network Predator-Prey Model with Pursuit and Evasion. *Physical Review E*, *50*(6), 4531.

Boell, S. K., & Cecez-Kecmanovic, D. (2014). A Hermeneutic Approach for Conducting Literature Reviews and Literature Searches. *Communications of the Association for Information Systems*, *34*(1), 257–286.

Boell, S. K., & Cecez-Kecmanovic, D. (2015). What is an Information System? In *2015 48th Hawaii International Conference on System Sciences* (pp. 4959-4968). IEEE.

Bondarouk, T., Parry, E., & Furtmueller, E. (2017). Electronic HRM: Four Decades of Research on Adoption and Consequences. *International Journal of Human Resource Management*, *28*(1), 98–131.

Borstorff, P. C., Marker, M. B., & Bennett, D. S. (2007). Online Recruitment: Attitudes and Behaviors of Job Seekers. *Journal of Strategic E-Commerce*, *5*(1/2), 1.

Boşcai, B. G. (2015). Niche Websites and Online Tools Used in Recruitment. *SEA: Practical Application of Science*, *3*(1), 113–120.

Braddy, P., Meade, A., Michael, J., & Fleenor, J. (2009). Internet Recruiting: Effects of Website Content Features on Viewers' Perceptions of Organizational Culture. *International Journal of Selection and Assessment*, *17*(1), 19–34.

Braddy, P., Thompson, L. F., Wuensch, K., & Grossnickle, W. (2003). Internet Recruiting: The Effects of Web Page Design Features. *Social Science Computer Review*, *21*(3), 374–385.

Branch, E. H. (2007). The Creation of Restricted Opportunity due to the Intersection of Race & Sex: Black Women in the Bottom Class. *Race, Gender & Class*, *14*(3/4), 247–264.

Brazelton, J., & Gorry, G. A. (2003). Creating a Knowledge-Sharing Community: If You Build It, Will They Come? *Communications of the ACM*, *46*(2), 23–25.

Breaugh, J. A. (2008). Employee Recruitment: Current Knowledge and Important Areas for Future Research. *Human Resource Management Review*, *18*(3), 103–118.

Breaugh, J. A., Macan, T. H., & Grambow, D. M. (2008). Employee Recruitment: Current Knowledge and Directions for Future Research. *International Review of Industrial and Organizational Psychology*, *23*, 45–82.

Broersma, L. (1997). Competition between Employed and Unemployed Job Searchers: Is there a Difference Between the UK and the Netherlands? *Applied Economics Letters*, *4*(3), 199–203.

Broughton, A., Foley, B., Ledermaier, S., & Cox, A. (2013). The Use of Social Media in the Recruitment Process. *Institute for Employment Studies*, *3*(13), 1–42.

Brown, R. (2003). History for the Non-Originalist. *Harvard Journal of Law & Public Policy*, *26*(1), 69–82.

Brown, V., & Vaughn, E. D. (2011). The Writing on the (Facebook) Wall: The Use of Social Networking Sites in Hiring Decisions. *Journal of Business and Psychology*, *26*(2), 219–225.

Brunetti, A., & Weder, B. (2003). A Free Press Is Bad News for Corruption. *Journal of Public Economics*, *87*(7), 1801–1824.

Bryant, A. (2002). Re-Grounding Grounded Theory. *Journal of Information Technology Theory and Application*, *4*(1), 25–42.

Buchanan, E. A., & Ess, C. (2008). Internet Research Ethics: The Field and Its Critical Issues. *The Handbook of Information and Computer Ethics*, *1*, 273–291.

Bucher, R., Fritz, C. E., & Quarantelli, E. L. (1956). Tape Recorded Interviews in Social Research. *American Sociological Review*, *21*(3), 359–364.

Bussey, W. H. (1917). The Origin of Mathematical Induction. *The American Mathematical Monthly*, *24*(5), 199–207.

Cappelli, P. (2001). Making the Most of On-Line Recruiting. *Harvard Business Review*, *79*(3), 139–146.

Carr, E. C., & Worth, A. (2001). The Use of the Telephone Interview for Research. *Nursing Times Research*, *6*(1), 511–524.

Carusi, C., Bianchi, G., & Bracciale, L. (2018). An Online Approach for Joint Task Assignment and Worker Evaluation in Crowd-Sourcing. *Pervasive and Mobile Computing*, *50*, 94–113.

Chang, W., Chen, Y., & Wang, P. (2019). Hotspot Mitigation for Mobile Edge Computing. *IEEE Transactions on Sustainable Computing*, 1–1.

Chapin, N. (2000). Software Maintenance Types-A Fresh View. *Proceedings of the International Conference on Software Maintenance (ICSM'00)*, 247–252. San Jose, CA, USA: IEEE.

Chapin, N., Hale, J. E., Khan, K. M., Ramil, J. F., & Tan, W.-G. (2001). Types of Software Evolution and Software Maintenance. *Journal of Software Maintenance and Evolution: Research and Practice*, *13*(1), 3–30.

Charmaz, K. (2006). *Constructing Grounded Theory: A Practical Guide Through Qualitative Analysis.* SAGE Publications Inc.

Charmaz, K. (2008). Constructionism and the Grounded Theory Method. In *Handbook of Constructionist Research* (pp. 397–412). The Guilford Press.

Charmaz, K. (2009). Shifting the Grounds: Constructivist Grounded Theory Methods. In *Developing Grounded Theory: The Second Generation* (pp. 127–193). Left Cost Press, Inc.

Charoensukmongkol, P., & Moqbel, M. (2014). Does Investment in ICT Curb or Create More Corruption? A Cross-Country Analysis. *Public Organization Review*, *14*(1), 51–63.

Chen, S., & Kang, S. (2018). A Tutorial on 5G and the Progress in China. *Frontiers of Information Technology & Electronic Engineering*, *19*(3), 309–321.

Chen, Y. (2014). Production Cultures and Differentiations of Digital Labour. *TripleC: Communication, Capitalism & Critique*, *12*(2), 648–667–648–667.

Chiwara, J. R., Chinyamurindi, W. T., & Mjoli, T. Q. (2017). Factors That Influence the Use of the Internet for Job-Seeking Purposes Amongst a Sample of Final-Year Students in the Eastern Cape Province of South Africa. *SA Journal of Human Resource Management*, *15*(1), 1–9.

Christensen, O. (2011). The Literature Review in Classic Grounded Theory Studies: A methodological Note. *The Grounded Theory Review*, *10*(3), 21–26.

Chung, T. H., Hollinger, G. A., & Isler, V. (2011). Search and Pursuit-Evasion in Mobile Robotics. *Autonomous Robots*, *31*(4), 299 – 316.

Clark, L. A., & Roberts, S. J. (2010). Employer's Use of Social Networking Sites: A Socially Irresponsible Practice. *Journal of Business Ethics*, *95*(4), 507–525.

Clayton, P. (1997). Inference to the Best Explanation. *Zygon*, *32*(3), 377–391.

Cober, R. T., Brown, D. J., & Levy, P. E. (2004). Form, Content, and Function: An Evaluative Methodology for Corporate Employment Web Sites. *Human Resource Management*, *43*(2–3), 201–218.

Colby, T. B., & Smith, P. (2009). Living Originalism. *Duke Law Journal*, *59*, 239–307.

Colquitt, J. A., & Zapata-Phelan, C. P. (2007). Trends in Theory Building and Theory Testing: A Five-Decade Study of the 'Academy of Management Journal'. *The Academy of Management Journal*, *50*(6), 1281–1303.

Combs, J. P., Bustamante, R. M., & Onwuegbuzie, A. J. (2010). An Interactive Model for Facilitating Development of Literature Reviews. *International Journal of Multiple Research Approaches*, *4*(2), 159–182.

Corley, K. G. (2015). A Commentary on "What Grounded Theory Is…" Engaging a Phenomenon from the Perspective of Those Living it. *Organizational Research Methods*, *18*(4), 600–605.

Corley, K. G., & Gioia, D. A. (2011). Building Theory About Theory Building: What Constitutes a Theoretical Contribution? *Academy of Management Review*, *36*(1), 12–32.

Crawford, V. P., & Knoer, E. M. (1981). Job Matching with Heterogeneous Firms and Workers. *Econometrica: Journal of the Econometric Society*, *49*(2), 437–450.

Creswell, J. W. (2009). *Research Design: Qualitative, Quantitative, and Mixed Methods Approaches* (Third). SAGE Publications Inc.

Cutcliffe, J. R. (2000). Methodological Issues in Grounded Theory. *Journal of Advanced Nursing*, *31*(6), 1476–1484.

Dasgupta, S., Agarwal, D., Ioannidis, A., & Gopalakrishnan, S. (1999). Determinants of Information Technology Adoption: An Extension of Existing Models to Firms in a Developing Country. *Journal of Global Information Management*, *7*(3), 30–40.

Davison, H. K., Maraist, C., & Bing, M. N. (2011). Friend or Foe? The Promise and Pitfalls of Using Social Networking Sites for HR Decisions. *Journal of Business and Psychology*, *26*(2), 153–159.

Day, T., & Kincaid, H. (1994). Putting Inference to the Best Explanation in Its Place. *Synthese*, *98*(2), 271–295.

DeSanctis, G. (2003). The Social Life of Information Systems Research: A Response to Benbasat and Zmud's Call for Returning to the IT Artifact. *Journal of the Association for Information Systems*, *4*(1), 360–376.

Dey, I. (2007). Grounding Categories. *The Sage Handbook of Grounded Theory*, (Part III), 167–90.

Diamond, P. A. (1982). Aggregate Demand Management in Search Equilibrium. *Journal of Political Economy*, *90*(5), 881–894.

Dittus, M., Quattrone, G., & Capra, L. (2017). Mass Participation During Emergency Response: Event-centric Crowdsourcing in Humanitarian Mapping. *Proceedings of the 2017 ACM Conference on Computer Supported Cooperative Work and Social Computing*, 1290–1303. New York, NY, USA.

Doody, O., & Noonan, M. (2013). Preparing and Conducting Interviews to Collect Data. *Nurse Researcher*, *20*(5), 28–32.

Druker, J., & Stanworth, C. (2004). Mutual Expectations: A Study of the Three-Way Relationship Between Employment Agencies, their Client Organisations and White-Collar Agency 'temps'. *Industrial Relations Journal*, 35(1), 58–75.

Duchscher, J. E. B., & Morgan, D. (2004). Grounded Theory: Reflections on the Emergence vs. Forcing Debate. *Journal of Advanced Nursing*, *48*(6), 605–612.

Duffy, K., Ferguson, C., & Watson, H. (2004). Data Collecting in Grounded Theory-Some Practical Issues. *Nurse Researcher*, *11*(4), 67–78.

Dysart, J. (2018). Quantum Computing: The End of Encryption? *Communications of the ACM*, *61*(5), 28–28.

Ecken, P., Gnatzy, T., & von der Gracht, H. A. (2011). Desirability Bias in Foresight: Consequences for Decision Quality Based on Delphi Results. *Technological Forecasting and Social Change*, *78*(9), 1654–1670.

Ehrhart, K. H., Mayer, D. M., & Ziegert, J. C. (2012). Web-Based Recruitment in the Millennial Generation: Work–Life Balance, Website Usability, and Organizational Attraction. *European Journal of Work and Organizational Psychology*, *21*(6), 850–874.

Eisenhardt, K. M. (1989). Agency Theory: An Assessment and Review. *Academy of Management Review*, *14*(1), 57–74.

Erastus, L., Jere, N., & Shava, F. B. (2017). A Security Model for Namibian Government Services. *IST-Africa Week Conference (IST-Africa), 2017*, 1–11. Windhoek, Namibia: IEEE.

Etzo, S., & Collender, G. (2010). The Mobile Phone 'Revolution' in Africa: Rhetoric or Reality? *African Affairs*, *109*(437), 659–668.

Faliagka, E., Iliadis, L., Karydis, I., Rigou, M., Sioutas, S., Tsakalidis, A., & Tzimas, G. (2014). On-line Consistent Ranking on E-recruitment: Seeking the Truth Behind a Well-formed CV. *Artificial Intelligence Review*, *42*(3), 515–528.

Faliagka, E., Tsakalidis, A., & Tzimas, G. (2012). An Integrated E-recruitment System for Automated Personality Mining and Applicant Ranking. *Internet Research; Bradford*, *22*(5), 551–568.

Feigl, H. (1934). The Logical Character of the Principle of Induction. *Philosophy of Science*, *1*(1), 20–29.

Feldman, D. C. (2004). What are We Talking About When We Talk About Theory? *Journal of Management*, *30*(5), 565–567.

Feldman, D. C., & Klaas, B. S. (2002). Internet Job Hunting: A Field Study of Applicant Experiences With On-Line Recruiting. *Human Resource Management*, *41*(2), 175–192.

Fine, A. (1975). How to Compare Theories: Reference and Change. *Nous*, *9*(1), 17–32.

Fomin, F. V., & Thilikos, D. M. (2008). An Annotated Bibliography on Guaranteed Graph Searching. *Theoretical Computer Science*, *399*(3), 236–245.

Forde, C. (2001). Temporary Arrangements: The Activities of Employment Agencies in the UK. *Work, Employment & Society*, *15*(3), 631–644.

Fountain, C. (2005). Finding a Job in the Internet Age. *Social Forces*, *83*(3), 1235–1262.

Freeman, R. B. (2002). The Labour Market in the New Information Economy. *Oxford Review of Economic Policy*, *18*(3), 288–305.

Freese, L. (1980). Formal Theorizing. *Annual Review of Sociology*, *6*(1), 187–212.

Frege, G. (1948). Sense and Reference. *The Philosophical Review*, *57*(3), 209–230.

Fromm, J., Mirbabaie, M. & Stieglitz, S. (2020). A Systematic Review of Empirical Affordance Studies: Recommendations for Affordance Research in Information Systems. *ECIS 2020 Research-in-Progress Papers*. 42. https://aisel.aisnet.org/ecis2020_rip/42

Fuchs, C., & Sevignani, S. (2013). What Is Digital Labour? What Is Digital Work? What's their Difference? And Why Do These Questions Matter for Understanding Social Media? *TripleC: Communication, Capitalism & Critique*, *11*(2), 237–293.

Furtmueller, E. (2012). *Using Technology for Global Recruitment: Why HR/OB Scholars Need Is Knowledge?* (PhD, University of Twente). https://doi.org/10.3990/1.9789036533843

Furtmueller, E. (2013). Current Trends in Employee Recruitment Using the Internet. *International Conference of Software Business*, 73–78. Springer.

Furtmueller, E., Wilderom, C. P. M., & Tate, M. (2011). Managing Recruitment and Selection in the Digital Age: E-HRM and Resumes. *Human Systems Management*, *30*(4), 243–259.

Gabriel, C., & Macdonald, L. (2018). After the International Organization for Migration: Recruitment of Guatemalan temporary agricultural workers to Canada. *Journal of Ethnic and Migration Studies*, *44*(10), 1706–1724.

Gale, D., & Shapley, L. S. (1962). College Admissions and the Stability of Marriage. *The American Mathematical Monthly*, *69*(1), 9–15.

García-Izquierdo, A. L., Aguinis, H., & Ramos-Villagrasa, P. J. (2010). Science-Practice Gap in E-recruitment. *International Journal of Selection & Assessment*, *18*(4), 432–438.

García-Izquierdo, A. L., Aguinis, H., & Ramos-Villagrasa, P. J. (2010). Science–practice gap in e-recruitment. *International Journal of Selection and Assessment*, *18*(4), 432–438.

Ghazzawi, K., & Accoumeh, A. (2014). Critical Success Factors of the E-recruitment System. *Journal of Human Resources Management and Labor Studies*, *2*(2), 159–170.

Girard, A., & Fallery, B. (2009). E-recruitment: New Practices, New Issues. An Exploratory Study. In T. Boudarouk & H. Ruel (Eds.), *Human Resource Information System* (pp. 39–48). INSTICC Press.

Glaser, B. G. (1978). *Advances in the Methodology of Grounded Theory: Theoretical Sensitivity*. California, USA: Sociology Press.

Glaser, B. G. (1992). *Basics of Grounded Theory Analysis: Emergence vs Forcing*. California, USA: Sociology Press.

Glaser, B. G. (1998). *Doing Grounded Theory: Issues and Discussions*. California, USA: Sociology Press.

Glaser, B. G. (2004). Remodelling Grounded Theory. *Grounded Theory Review*, *4*(1), 1–24.

Glaser, B. G. (2007). *Doing Formal Grounded Theory: A Proposal*. California, USA: Sociology Press.

Glaser, B. G. (2011). *Getting Out of the Data: Grounded Theory Conceptualization*. California, USA: Sociology Press.

Glaser, B. G. (2012). *Stop, Write: Writing Grounded Theory*. California, USA: Sociology Press.

Glaser, B. G. (2013). *No Preconceptions: The Grounded Theory Dictum*. California, USA: Sociology Press.

Glaser, B. G. (2014). *Memoing: A Vital Grounded Theory Procedure*. California, USA: Sociology Press.

Glaser, B. G., & Holton, J. (2005). Staying Open: The Use of Theoretical Codes in Grounded Theory. *The Grounded Theory Review*, *5*(1), 1–20.

Glaser, B. G., & Strauss, A. L. (1967). *The Discovery of Grounded Theory: Strategies for Qualitative Research*. Chicago, Aldine Publishing Company.

Glick, P., Zion, C., & Nelson, C. (1988). What Mediates Sex Discrimination in Hiring Decisions? *Journal of Personality and Social Psychology*, *55*(2), 178–186.

Glogowska, M., Young, P., & Lockyer, L. (2011). Propriety, Process and Purpose: Considerations of the Use of the Telephone Interview Method in an Educational Research Study. *Higher Education*, *62*(1), 17–26.

Goltz, U., Reussner, R. H., Goedicke, M., Hasselbring, W., Märtin, L., & Vogel-Heuser, B. (2014). Design for Future: Managed Software Evolution. *Computer Science - Research and Development*, *30*(3–4), 321–331.

Goodhue, D. (1988). I/S Attitudes: Toward Theoretical and Definitional Clarity. *ACM SIGMIS Database*, *19*(3–4), 6–15.

Goodhue, D., & Thompson, R. (1995). Task-Technology Fit and Individual Performance. *MIS Quarterly*, *19*(2), 213–236.

Gostin, L. O., Turek-Brezina, J., Powers, M., Kozloff, R., Faden, R., & Steinauer, D. D. (1993). Privacy and Security of Personal Information in a New Health Care System. *JAMA*, *270*(20), 2487–2493.

Gregor, S. (2006). The Nature of Theory in Information Systems. *MIS Quarterly*, *30*(3), 611–642.

Gregor, S. (2014). Theory—Still King but Needing a Revolution! *Journal of Information Technology*, *29*(4), 337–340.

GSM Association. (2018). *The Mobile Economy 2018*. London, UK: GSM Association.

Gyure, M. E., Quillin, J. M., Rodríguez, V. M., Markowitz, M. S., Corona, R., Borzelleca, J., … Bodurtha, J. N. (2014). Practical Considerations for Implementing Research Recruitment Etiquette. *IRB: Ethics & Human Research*, *36*(6), 7–12.

Hakel, K. (2015). Oscillating between Conservation and Investment: A Grounded Theory of Students' Strategies for Optimizing Personal Resources. *Grounded Theory Review*, *14*(1), 11–25.

Hargittai, E., & Hsieh, Y. P. (2012). Succinct Survey Measures of Web-Use Skills. *Social Science Computer Review*, *30*(1), 95–107.

Harman, G. H. (1965). The Inference to the Best Explanation. *The Philosophical Review*, *74*(1), 88–95. https://doi.org/10.2307/2183532

Harman, G. H. (1968). Enumerative Induction as Inference to the Best Explanation. *The Journal of Philosophy*, *65*(18), 529–533.

Harmse, A., Blaauw, P., & Schenck, C. (2009). Day Labourers, Unemployment and Socio-Economic Development in South Africa. *Urban Forum*, *20*(4), 363–377.

Hauser, M., Cushman, F., Young, L., Kang-Xing Jin, R., & Mikhail, J. (2007). A Dissociation Between Moral Judgments and Justifications. *Mind & Language*, *22*(1), 1–21.

Heijke, H., Meng, C., & Ris, C. (2003). Fitting to the Job: The Role of Generic and Vocational Competencies in Adjustment and Performance. *Labour Economics*, *10*(2), 215–229.

Hoehle, H. (2011). Consumer Intentions to Use Electronic Banking Channels: The Role of Task-Channel Fit. (PhD, Victoria University of Wellington).

Hogan, K. (2017). Is the Machine Question the Same Question as the Animal Question? *Ethics and Information Technology*, *19*(1), 29–38.

Hogler, R. L., Henle, C., & Bemus, C. (1998). Internet Recruiting and Employment Discrimination: A Legal Perspective. *Human Resource Management Review*, *8*(2), 149.

Holm, A. B. (2012). E-recruitment: Towards an Ubiquitous Recruitment Process and Candidate Relationship Management. *Zeitschrift Für Personalforschung / German Journal of Research in Human Resource Management*, *26*(3), 241–259.

Holm, A. B. (2014). Institutional Context and E-recruitment Practices of Danish Organizations. *Employee Relations*, *36*(4), 432–455.

Holton, J. A. (2010). The Coding Process and its Challenges. *The SAGE Handbook of Grounded Theory*, *9*(1), 21–40.

Hood, J. C. (2007). Orthodoxy vs. Power: The Defining Traits of Grounded Theory. In A. Bryant & K. Charmaz (Eds.), *The SAGE Handbook of Grounded Theory* (pp. 151–164). SAGE Publications Ltd.

Huston, P., & Naylor, C. D. (1996). Health Services Research: Reporting on Studies Using Secondary Data Sources. *CMAJ: Canadian Medical Association Journal*, *155*(12), 1697–1702.

Hydén, M. (2014). The Teller-Focused Interview: Interviewing as a Relational Practice. *Qualitative Social Work*, *13*(6), 795–812.

Isler, V., Kannan, S., & Khanna, S. (2005). Randomized Pursuit-Evasion in a Polygonal Environment. *Robotics, IEEE Transactions on Robotics*, *21*(5), 875–884.

Jackson, J. (1990). "I am a Fieldnote": Fieldnotes as a Symbol of Professional Identity. In *Fieldnotes: The makings of anthropology* (pp. 3–33). Itaca and London: Cornell University Press.

Jackson, S., Pompe, A., & Krieshok, G. (2012). Repair Worlds: Maintenance, Repair, and ICT for Development in Rural Namibia. *Proceedings of the ACM 2012 Conference on Computer Supported Cooperative Work*, 107–116. Seattle, Washington, USA: ACM.

Jansen, B. J., Jansen, K. J., & Spink, A. (2005). Using the web to look for work: Implications for online job seeking and recruiting. *Internet Research*, *15*(1), 49–66.

Jarke, M., & Lyytinen, K. (2015). Editorial: "Complexity of Systems Evolution: Requirements Engineering Perspective". *ACM Transactions on Management Information Systems (TMIS)*, *5*(3), 11.

Jarrahi, M. H. (2018). Artificial Intelligence and the Future of Work: Human-AI Symbiosis in Organizational Decision Making. *Business Horizons*, *61*(4), 577–586.

Jarrett, J., & Blake, M. B. (2015). Collaborative Infrastructure for On-Demand Crowdsourced Tasks. *2015 IEEE 24th International Conference on Enabling Technologies: Infrastructure for Collaborative Enterprises*, 9–14.

Jauch, H. (2012). Poverty, Unemployment and Inequality in Namibia. *TEMTI Series of Economic Perspectives on Global Sustainability, EP*, 02–2013.

Jovanovic, B. (1979). Job Matching and the Theory of Turnover. *The Journal of Political Economy*, *87*(5), 972–990.

Jovanovic, B. (1984). Matching, Turnover, and Unemployment. *The Journal of Political Economy*, *92*(1), 108–122.

Kashi, K., & Zheng, C. (2013). Extending Technology Acceptance Model to the E-recruitment Context in Iran. *International Journal of Selection & Assessment*, *21*(1), 121–129.

Kawulich, B. B. (2005). Participant Observation as a Data Collection Method. *Forum Qualitative Sozialforschung / Forum: Qualitative Social Research*, *6*(2), Article 43.

Kelso Jr, A. S., & Crawford, V. P. (1982). Job Matching, Coalition Formation, and Gross Substitutes. *Econometrica: Journal of the Econometric Society*, *50*(6), 1483–1504.

Kennedy, E. J. (2010). The Invisible Corner: Expanding Workplace Rights for Female Day Laborers. *Berkeley Journal of Employment and Labor Law*, *31*(1), 126–159.

Khan, N. U. R., Taha, S. M., & Ghourl, A. M. (2011). Bridging the Gap Through E-Recruitment: Evidences from Private Employment Sector in Karachi. *Indian Journal of Commerce and Management Studies*, *II*(6), 40–48.

Khatiwada, L. K., & Silva, J. A. (2015). Mitigating Gender Inequality in Rural Regions: The Effects of Tourism Employment in Namibia. *International Journal of Tourism Research*, *17*(5), 442–450.

Kinder, T. (2000). The Use of the Internet in Recruitment—Case Studies from West Lothian, Scotland. *Technovation*, *20*(9), 461–475.

Kitchenham, B. A., Travassos, G. H., Von Mayrhauser, A., Niessink, F., Schneidewind, N. F., Singer, J., … Yang, H. (1999). Towards an Ontology of Software Maintenance. *Journal of Software Maintenance*, *11*(6), 365–389.

Klein, H. K., & Myers, M. D. (1999). A Set of Principles for Conducting and Evaluating Interpretive Field Studies in Information Systems. *MIS Quarterly*, *23*(1), 67–94.

Koch, T., Gerber, C., & Klerk, J. J. de. (2018). The Impact of Social Media on Recruitment: Are You LinkedIn? *SA Journal of Human Resource Management*, *16*(2), 1–14.

Koong, K. S., Liu, L. C., & Williams, D. L. (2002). An Identification of Internet Job Board Attributes. *Human Systems Management*, *21*(2), 129–135.

Kraut, R., Olson, J., Banaji, M., Bruckman, A., Cohen, J., & Couper, M. (2004). Psychological Research Online: Report of Board of Scientific Affairs' Advisory Group on the Conduct of Research on the Internet. *American Psychologist*, *59*(2), 105–117.

Krepapa, A., & Berthon, P. (2003). Making Meaning: Interpretive Diversity and Market Learning-A Model and Propositions. *Marketing Theory*, *3*(2), 187–208.

Lang, S., Laumer, S., Maier, C., & Eckhardt, A. (2011). Drivers, Challenges and Consequences of E-recruiting: A Literature Review. *Proceedings of the 49th SIGMIS Annual Conference on Computer Personnel Research*, 26–35. San Antonio, Texas, USA: ACM.

Lee, I. (2005). An Analytical Model of E-recruiting Investment Decision: An Economic Employment Approach. *IEEE Transactions on Engineering Management*, *52*(4), 486–496.

Lee, I. (2007). An Architecture for a Next-Generation Holistic E-Recruiting System. *Communications of the ACM*, *50*(7), 81–85.

Lee, I. (2011). Modeling the Benefit of E-recruiting Process Integration. *Decision Support Systems*, *51*(1), 230–239.

Lempert, L. B. (2007). Asking Questions of the Data: Memo Writing in the Grounded. In *The Sage Handbook of Grounded Theory* (Eds, pp. 245–264). Los Angeles, USA: SAGE Publications Ltd.

Levy, Y., & Ellis, T. J. (2006). A Systems Approach to Conduct an Effective Literature Review in Support of Information Systems Research. *Informing Science Journal*, *9*, 181–212.

Lewis, C. I. (1946). *An Analysis of Knowledge and Valuation* (1st ed.). La Salle Illinois: The Open Court Publishing Company.

Li, J. (2008). Ethical Challenges in Participant Observation: A Reflection on Ethnographic Fieldwork. *The Qualitative Report*, *13*(1), 100–115.

Lievens, F., & Harris, M. M. (2003). Research on Internet Recruiting and Testing: Current Status and Future Directions. *International Review of Industrial and Organizational Psychology*, *18*, 131–166.

Lindsay, C. (2005). Employability, Services for Unemployed Job Seekers and the Digital Divide. *Urban Studies*, *42*(2), 325–339.

Lipton, P. (2004). *Inference to the Best Explanation*. Psychology Press.

Liu, Q., Shi, X., Wang, X., & Li, J. (2017). 5G Development in China: From Policy Strategy to User-Oriented Architecture. *Mobile Information Systems*, *2017*(1), 1–11.

Llorens, J. J. (2011). A Model of Public Sector E-Recruitment Adoption in a Time of Hyper Technological Change. *Review of Public Personnel Administration*, *31*(4), 410–423.

Locke, K. (2015). Pragmatic Reflections on a Conversation About Grounded Theory in Management and Organization Studies. *Organizational Research Methods*, *18*(4), 612–619.

Macan, T. (2009). The Employment Interview: A Review of Current Studies and Directions for Future Research. *Human Resource Management Review*, *19*(3), 203–218.

Mahbub, S., & Pardede, E. (2018). *Using Contextual Features for Online Recruitment Fraud Detection*.

Marler, J. H., & Fisher, S. L. (2013). An Evidence-Based Review of E-HRM and Strategic Human Resource Management. *Human Resource Management Review*, *23*(1), 18–36.

Matavire, R., & Brown, I. (2013). Profiling Grounded Theory Approaches in Information Systems Research. *European Journal of Information System*, *22*(1), 119–129.

Mathieson, K. (1991). Predicting User Intentions: Comparing the Technology Acceptance Model with the Theory of Planned Behavior. *Information Systems Research*, *2*(3), 173–191.

Maurer, S. D., & Cook, D. P. (2011). Using Company Web Sites to E-recruit Qualified Applicants: A Job Marketing Based Review of Theory-Based Research. *Computers in Human Behavior*, *27*(1), 106–117.

McCall, B. P. (1990). Occupational Matching: A Test of Sorts. *Journal of Political Economy*, *98*(1), 45–69.

McCallin, A. M. (2006). Grappling with the Literature in a Grounded Theory Study. *The Grounded Theory Review: An International Journal*, *5*(2\3), 11–28.

McCubbrey, D. J. (2003). The IS Core-IV: IS Research: A Third Way. *Communications of the Association for Information Systems*, *12*(1), 553–556.

McKay, S. (2008). Employer Motivations for using Agency Labour: Hard Work, Hidden Lives: The Full Report of the TUC Commission on Vulnerable Employment. *Industrial Law Journal*, *37*(3), 296–299.

McLaren, A. (2001). Ethical and Social Considerations of Stem Cell Research. *Nature*, *414*(6859), 129–131.

Melanthiou, Y., Pavlou, F., & Constantinou, E. (2015). The Use of Social Network Sites as an E-recruitment Tool. *Journal of Transnational Management*, *20*(1), 31–49.

Merton, R. K. (1967). *On Theoretical Sociology: Five Essays, Old and New*. New York: Free Press, New York.

Milgrom, P. R. (2005). Matching With Contracts. *American Economic Review*, *95*(4), 913–935.

Miller, R. A. (1984). Job Matching and Occupational Choice. *The Journal of Political Economy*, *92*(6), 1086–1120.

Millson, J., & Straβer, C. (2019). A Logic for Best Explanations. *Journal of Applied Non-Classical Logics*, *29*(2), 184–231.

Mingers, J. (2001). Combining IS Research Methods: Towards a Pluralist Methodology. *Information Systems Research*, *12*(3), 240–259.

Molyneux, S., Kamuya, D., & Marsh, V. (2010). Community Members Employed on Research Projects Face Crucial, Often Under-Recognized, Ethical Dilemmas. *American Journal of Bioethics*, *10*(3), 24–26.

Montgomery, P., & Bailey, P. H. (2007). Field Notes and Theoretical Memos in Grounded Theory. *Western Journal of Nursing Research*, *29*(1), 65–79.

Moore, A. D. (2011). Privacy, Security, and Government Surveillance: WikiLeaks and the New Accountability. *Public Affairs Quarterly*, *25*(2), 141–156.

Moore, A. D. (2016). Privacy, Speech, and Values: What We Have No Business Knowing. *Ethics and Information Technology*, *18*(1), 41–49.

Morse, J. M. (2010). Sampling in Grounded Theory. In *The SAGE Handbook of Grounded Theory* (pp. 229–244). SAGE Publications Ltd.

Mortensen, D. T. (1982). The Matching Process as a Noncooperative Bargaining Game. In *The Economics of Information and Uncertainty* (pp. 233–258). National Bureau of Economic Research, Inc.

Mortensen, D. T. (1988). Matching: Finding a Partner for Life or Otherwise. *American Journal of Sociology*, *94*, S215–S240.

Mortensen, D. T., & Pissarides, C. A. (1994). Job Creation and Job Destruction in the Theory of Unemployment. *The Review of Economic Studies*, *61*(3), 397–415.

Mortensen, D. T., & Pissarides, C. A. (1999). New Developments in Models of Search in the Labor Market. *Handbook of Labor Economics*, *3*(Part B), 2567–2627.

Moscarini, G. (2005). Job Matching and the Wage Distribution. *Econometrica*, *73*(2), 481–516.

Mothobi, O., & Grzybowski, L. (2017). Infrastructure Deficiencies and Adoption of Mobile Money in Sub-Saharan Africa. *Information Economics and Policy*, *40*, 71–79.

Mulhall, A. (2003). In the Field: Notes on Observation in Qualitative Research. *Journal of Advanced Nursing*, *41*(3), 306–313.

Musselwhite, K., Cuff, L., McGregor, L., & King, K. M. (2007). The Telephone Interview Is an Effective Method of Data Collection in Clinical Nursing Research: A Discussion Paper. *International Journal of Nursing Studies*, *44*(6), 1064–1070.

Mycielski, J. (1989). Theories of Pursuit and Evasion. *Journal of Optimization Theory and Applications*, *61*(1), 147–147.

Myers, M. D. (2003). The IS Core - VIII: Defining the Core Properties of the IS Disciplines: Not Yet, Not Now. *Communications of the Association for Information Systems*, *12*(1), 582–587.

Myers, M. D., & Newman, M. (2007). The Qualitative Interview In Is Research: Examining the Craft. *Information and Organization*, *17*(1), 2–26.

Namibia Statistics Agency. (2011). *Namibia 2011 Population and Housing Census Main Report* (pp. 1–213). Namibia Statistics Agency.

Namibia Statistics Agency. (2016). *Namibia Household Income and Expenditure Survey (NHIES) 2015/2016 Report* (No. 2015/2016). Windhoek, Namibia: Namibia Statistics Agency.

Namibia Statistics Agency. (2017). *Namibia Inter-censal Demographic Survey 2016 Report*. Namibia Statistics Agency.

Namibia Statistics Agency. (2019). *The Namibia Labour Force Survey 2018 Report*. Windhoek: Namibia Statistics Agency.

Nandhakumar, J., & Jones, M. (2002). Development Gain? Participant Observation in Interpretive Management Information Systems Research. *Qualitative Research*, *2*(3), 323–341.

Ndume, V., Tilya, F. N., & Twaakyondo, H. (2008). Challenges of Adaptive Elearning at Higher Learning Institutions: A Case Study in Tanzania. *International Journal of Computing and ICT Research*, *2*(1), 47–59.

Nelson, C. (2003). Originalism and Interpretive Conventions. *The University of Chicago Law Review*, *70*(2), 519–598.

Nengomasha, C. T., Uutoni, W., & Yule, W. (2012). School Libraries and Their Role in Promoting a Reading Culture: Case Study of Caprivi, Omusati, Omaheke, Karas and Khomas Regions of Namibia. *Journal for Studies in Humanities and Social Sciences*, *1*(1), 159–171.

Ngololo, E. N., Howie, S. J., & Plomp, T. (2012). An Evaluation of the Implementation of the National ICT Policy for Education in Namibian Rural Science Classrooms. *African Journal of Research in Mathematics, Science and Technology Education*, *16*(1), 4–17.

Niederle, M., & Roth, A. E. (2005). The Gastroenterology Fellowship Market: Should There Be a Match? *The American Economic Review*, *95*(2), 372–375.

Orlikowski, W. J., & Baroudi, J. J. (1991). Studying Information Technology in Organizations: Research Approaches and Assumptions. *Information Systems Research*, *2*(1), 1–28.

Orlikowski, W. J., & Iacono, C. S. (2001). Research Commentary: Desperately Seeking the "IT" in IT Research—A Call to Theorizing the IT Artifact. *Information Systems Research*, *12*(2), 121–134.

Orlikowski, W. J., & Scott, S. V. (2008). Sociomateriality: Challenging the separation of Technology, Work and Organization. *The Academy of Management Annals*, *2*(1), 433–474.

Parry, E., & Tyson, S. (2008). An Analysis of the Use and Success of Online Recruitment Methods in the UK. *Human Resource Management Journal*, *18*(3), 257–274.

Parry, E., & Wilson, H. (2009). Factors Influencing the Adoption of Online Recruitment. *Personnel Review*, *38*(6), 655–673.

Parsons, T. D. (1978). Pursuit-Evasion in a Graph. In *Theory and Applications of Graphs* (Lecture Notes in Mathematics, pp. 426–441). Berlin, Heidelberg: Springer.

Paul, D. G. (2016). The Millennial Morphing of the Digital Divide and Its Implications for African American Youngsters in a New Literacies Era (Commentary). *The Journal of Negro Education; Washington*, *85*(4), 407–415.

Pavon, F., & Brown, I. (2010). Factors Influencing the Adoption of the World Wide Web for Job-Seeking in South Africa. *South African Journal of Information Management*, *12*(1), 1–9.

Pawson, R. (2003). Nothing as Practical as a Good Theory. *Evaluation*, *9*(4), 471–490.

Peters, D. (2014). What Elements of Successful Scientific Theories Are the Correct Targets for "Selective" Scientific Realism? *Philosophy of Science*, *81*(3), 377–397.

Pfieffelmann, B., Wagner, S. H., & Libkuman, T. (2010). Recruiting on Corporate Web Sites: Perceptions of Fit and Attraction. *International Journal of Selection and Assessment*, *18*(1), 40–47.

Philip, L., Cottrill, C., Farrington, J., Williams, F., & Ashmore, F. (2017). The Digital Divide: Patterns, Policy and Scenarios for Connecting the 'Final Few' in Rural Communities Across Great Britain. *Journal of Rural Studies*, *54*, 386–398.

Phillips, C. (2007). Today's Talent Contest: The Battle for Talent in the UK Is Hotting Up. *Human Resource Management International Digest*, *15*(3), 3–5.

Ployhart, R. E. (2006). Staffing in the 21st Century: New Challenges and Strategic Opportunities. *Journal of Management*, *32*(6), 868–897.

Popper, K. (2005). *The Logic of Scientific Discovery* (1st ed.). London and New York: Routledge.

Ram, M. (1992). Coping With Racism: Asian Employers in the Inner-City. *Work, Employment and Society*, *6*(4), 601–618.

Ramphele, M. (1989). The Dynamics of Gender Politics in the Hostels of Cape Town: Another Legacy of the South African Migrant Labour System. *Journal of Southern African Studies*, *15*(3), 393–414.

Reddy, M. N., & Mamatha, T. (2017). Development of E-recruitment Portal for It Industry With Effective Fraud Detection. *International Journal of Innovations & Advancement in Computer Science*, *6*(10), 462–466.

Reja, U., Manfreda, K. L., Hlebec, V., & Vehovar, V. (2003). Open-ended vs. Close-ended Questions in Web Questionnaires. *Developments in Applied Statistics*, *19*, 159–177.

Remmert, D. (2019). *Facing the Digital Challenge* (p. 40). Windhoek, Namibia: Institute for Public Policy Research.

Robey, D. (2003). Identity, Legitimacy and the Dominant Research Paradigm: An Alternative Prescription for the IS Discipline: A Response to Benbasat and Zmud's Call for Returning to the IT Artifact. *Journal of the Association for Information Systems*, *4*(1), 352–359.

Robst, J. (1995). Career Mobility, Job Match, and Overeducation. *Eastern Economic Journal*, *21*(4), 539–550.

Roos, L., & Jordaan, A. (2006). Access to Information and Communication: Estimating the Determinants of Internet Usage in South Africa. *Journal for Communication Sciences in Southern Africa*, *25*(1), 1–22.

Roth, A. E. (1986). On the Allocation of Residents to Rural Hospitals: A General Property of Two-Sided Matching Markets. *Econometrica*, *54*(2), 425–427.

Roth, A. E., Sönmez, T., & Ünver, M. U. (2005). A Kidney Exchange Clearinghouse in New England. *The American Economic Review*, *95*(2), 376–380.

Roth, A. E., & Sotomayor, M. A. O. (1992). *Two-Sided Matching: A Study in Game-Theoretic Modeling and Analysis*. Cambridge: Cambridge University Press.

Roth, A. E., & Vate, J. H. V. (1990). Random Paths to Stability in Two-Sided Matching. *Econometrica: Journal of the Econometric Society*, *58*(6), 1475–1480.

Rowsell, J., Morrell, E., & Alvermann, D. E. (2017). Confronting the Digital Divide: Debunking Brave New World Discourses. *The Reading Teacher*, *71*(2), 157–165.

Rubinsky, S., & Gutman, S. (2014). Three-Player Pursuit and Evasion Conflict. *Journal of Guidance, Control, and Dynamics*, *37*(1), 98–110.

Ryen, A. (2008). Trust in Cross-Cultural Research The Puzzle of Epistemology, Research Ethics and Context. *Qualitative Social Work*, *7*(4), 448–465.

Ryll-Nardzewski, C. (1962). *A Theory of Pursuit and Evasion*. Santa Monica, CA: Rand Corporation.

Sassi, S., & Ben Ali, M. S. (2017). Corruption in Africa: What Role Does ICT Diffusion Play. *Telecommunications Policy*, *41*(7), 662–669.

Satyanarayanan, M. (2017). Edge Computing. *Computer*, *50*(10), 36–38.

Saunders, C., & Wu, Y. (2003). The IS Core-VI: Further Along the Road to the IT Artifact. *Communications of the Association for Information Systems*, *12*(1), 562–567.

Schenck, C., & Blaauw, P. F. (2008). Day Labourers in Pretoria, Windhoek and the United States-A Comparison of Two Capitals and a Different World. *Professional Accountant*, *8*(1), 90–102.

Schenck, C., Xipu, L., & Blaauw, D. (2012). What Happens During Those Long Hours Next to the Road? An Exploratory Study of Three Informal Day Labour Hiring Sites in Tshwane. *Social Work/Maatskaplike Werk*, *48*(1), 35–46.

Schultze, U., & Avital, M. (2011). Designing Interviews to Generate Rich Data for Information Systems Research. *Information and Organization*, *21*(1), 1–16.

Schwartz, M. S., & Schwartz, C. G. (1955). Problems in Participant Observation. *American Journal of Sociology*, *60*(4), 343–353.

Seidel, S., & Urquhart, C. (2013). On Emergence and Forcing in Information Systems Grounded Theory Studies: The Case of Strauss and Corbin. *Journal of Information Technology*, *28*(3), 237–260.

Selden, S., & Orenstein, J. (2011). Government E-recruiting Web Sites: The Influence of E-recruitment Content and Usability on Recruiting and Hiring Outcomes in US State Governments. *International Journal of Selection & Assessment*, *19*(1), 31–40.

Seminerio, M. (2001). E-Recruiting Takes Next Step. *EWeek*, *18*(16), 51-55+.

Serrano, R. (2013). Lloyd Shapley's Matching and Game Theory. *The Scandinavian Journal of Economics*, *115*(3), 599–618.

Shima, T., & Shinar, J. (2002). Time-Varying Linear Pursuit-Evasion Game Models with Bounded Controls. *Journal of Guidance, Control, and Dynamics*, *25*(3), 425–432.

Shuchman, M. (2014). Is Informed Consent in Research Sometimes Optional? *CMAJ : Canadian Medical Association Journal*, *186*(7), 495.

Siegel, R. B. (2008). Dead or Alive: Originalism As Popular Constitutionalism in Heller. *Harvard Law Review*, *122*(1), 191–2275.

Simón, C., & Esteves, J. (2016). The Limits of Institutional Isomorphism in the Design of E-Recruitment Websites: A Comparative Analysis of the USA and Spain. *International Journal of Human Resource Management*, *27*(1), 23–44.

Simon, C. J., & Warner, J. T. (1992). Matchmaker, Matchmaker: The Effect of Old Boy Networks on Job Match Quality, Earnings, and Tenure. *Journal of Labor Economics*, *10*(3), 306–330.

Singer, M. M. (2013). What Goes Around Comes Around: Perceived Vulnerable Employment and Economic Voting in Developing Countries. *European Journal of Political Research*, *52*(2), 143–163.

Skarlicki, D. P., Barclay, L. J., & Pugh, D. S. (2008). When Explanations for Layoffs Are Not Enough: Employer's Integrity as a Moderator of the Relationship Between Informational Justice and Retaliation. *Journal of Occupational and Organizational Psychology*, *81*(1), 123–146.

Smith, A. (2015). Introduction "What Grounded Theory Is…". *Organizational Research Methods*, *18*(4), 578–580.

Smith, A. D., & Rupp, W. T. (2004). Managerial Challenges of E-Recruiting: Extending the Life Cycle of New Economy Employees. *Online Information Review*, *28*(1), 61–74.

Smith, P. (2011). How Different are Originalism and Non-Originalism. *Hastings Law Journal*, *62*(3), 707–737.

Smyth, B., Bradley, K., & Rafter, R. (2002). Personalization Techniques for Online Recruitment Services. *Communications of the ACM*, *45*(5), 39–40.

Solée, R. V., Valverde, S., Casals, M. R., Kauffman, S. A., Farmer, D., & Eldredge, N. (2013). The Evolutionary Ecology of Technological Innovations. *Complexity*, *18*(4), 15–27.

Sommerville, I. (1996). Software Process Models. *ACM Computing Surveys (CSUR)*, *28*(1), 269–271.

Steel, David. (1997). Producing Monthly Estimates of Unemployment and Employment According to the International Labour Office Definition. *Journal of the Royal Statistical Society: Series A (Statistics in Society)*, *160*(1), 5–46.

Strauss, A. L. (1987). *Qualitative Analysis for Social scientists*. Cambridge University Press.

Strauss, A. L., & Corbin, J. (1998). *Basics of Qualitative Research: Techniques and Procedures for Developing Grounded Theory* (2nd ed.). SAGE Publications Inc.

Strong, D. M., & Volkoff, O. (2010). Understanding Organization—Enterprise System Fit: A Path to Theorizing the Information Technology Artifact. *MIS Quarterly*, *34*(4), 731–756.

Strong, D.M., Volkoff, O., Johnson, S.A., Pelletier, L.R., Tulu, B., Bar-On, I., Trudel, J. & Garber, L. (2014). A Theory of Organization-EHR Affordance Actualization. *Journal of the Association for Information Systems*. 15(2), 53–85.

Sylva, H., & Mol, S. T. (2009). E-Recruitment: A Study into Applicant Perceptions of an Online Application System. *International Journal of Selection and Assessment*, *17*(3), 311–323.

Tedlock, B. (1991). From Participant Observation to the Observation of Participation: The Emergence of Narrative Ethnography. *Journal of Anthropological Research*, *47*(1), 69–94.

Teweldemedhin, M. Y. (2015). Factors Influencing Income Inequality in Namibia. *British Journal of Economics, Management & Trade*, *10*(4), 1–14.

The Namibian. (2018). 2018 Rate Card Nam and RSA. *The Namibian*.

Theodore, N., Blaauw, D., Schenck, C., Valenzuela Jr, A., Schoeman, C., & Meléndez, E. (2015). Day Labor, Informality and Vulnerability in South Africa and the United States. *International Journal of Manpower*, *36*(6), 807–823.

Thomas, S. L., & Ray, K. (2000). Recruiting and the Web: High-tech Hiring. *Business Horizons*, *43*(3), 43–52.

Thornberg, R. (2012). Informed Grounded Theory. *Scandinavian Journal of Educational Research*, *56*(3), 243–259.

Tong, J. P., Duffy, V. G., Cross, G. W., Tsung, F., & Yen, B. P. (2005). Evaluating the Industrial Ergonomics of Service Quality for Online Recruitment Websites. *International Journal of Industrial Ergonomics*, *35*(8), 697–711.

Urquhart, C. (2013). *Grounded Theory for Qualitative Research: A Practical Guide* (1st ed.). SAGE Publications Ltd.

Urquhart, C., Lehmann, H., & Myers, M. D. (2010). Putting the 'Theory' Back into Grounded Theory: Guidelines for Grounded Theory Studies in Information Systems. *Information Systems Journal*, *20*(4), 357–381.

Vaast, E., & Levina, N. (2015). Speaking as One, but Not Speaking Up: Dealing With New Moral Taint in an Occupational Online Community. *Information and Organization*, *25*(2), 73–98.

van Deursen, A., & van Dijk, J. (2010). Measuring Internet Skills. *International Journal of Human–Computer Interaction*, *26*(10), 891–916.

van Deursen, A., & van Dijk, J. (2011). Internet Skills and the Digital Divide. *New Media & Society*, *13*(6), 893–911.

Van Hoye, G., & Lievens, F. (2007). Investigating Web-Based Recruitment Sources: Employee Testimonials vs Word-of-Mouse. *International Journal of Selection & Assessment*, *15*(4), 372–382.

Van Rooy, D. L., Alonso, A., & Fairchild, Z. (2003). In With the New, Out With the Old: Has the Technological Revolution Eliminated the Traditional Job Search Process? *International Journal of Selection & Assessment*, *11*(2/3), 170–174.

Ven, A. H. van de. (1989). Nothing Is Quite so Practical as a Good Theory. *The Academy of Management Review*, *14*(4), 486–489.

Venkatesh, V., Morris, M. G., Davis, G. B., & Davis, F. D. (2003). User Acceptance of Information Technology: Toward a Unified View. *MIS Quarterly*, *27*, 425–478.

Venkatraman, N. (1989). The Concept of Fit in Strategy Research: Toward Verbal and Statistical Correspondence. *Academy of Management Review*, *14*(3), 423–444.

Vicknair, J., Elkersh, D., Yancey, K., & Budden, M. C. (2010). The Use of Social Networking Websites as a Recruiting Tool for Employers. *American Journal of Business Education*, *3*(11), 7–12.

Vidal, R., Shakernia, O., Kim, H. J., Shim, D. H., & Sastry, S. (2002). Probabilistic Pursuit-Evasion Games: Theory, Implementation, and Experimental Evaluation. *Robotics and Automation, IEEE Transactions On*, *18*(5), 662–669.

Vidros, S., Kolias, C., & Kambourakis, G. (2016). Online Recruitment Services: Another Playground for Fraudsters. *Computer Fraud & Security*, *2016*(3), 8–13.

Vilardo, M. F. (2004). Online Impersonation in Securities Scams. *IEEE Security & Privacy*, *2*(3), 82–85.

Walker, H. J., Feild, H. S., Giles, W. F., Bernerth, J. B., & Short, J. C. (2011). So What Do You Think of the Organization? A Contextual Priming Explanation for Recruitment Web Site Characteristics As Antecedents of Job Seekers' Organizational Image Perceptions. *Organizational Behavior and Human Decision Processes*, *114*(2), 165–178.

Walsham, G. (1995). Interpretive Case Studies in IS Research: Nature and Method. *European Journal of Information System*, *4*(2), 74–81.

Walther, J. B. (2002). Research Ethics in Internet-Enabled Research: Human Subjects Issues and Methodological Myopia. *Ethics and Information Technology*, *4*(3), 205–216.

Wang, B., & Guo, X. (2012). Online Recruitment Information as an Indicator to Appraise Enterprise Performance. *Online Information Review; Bradford*, *36*(6), 903–918.

Wax, M., & Shapiro, L. J. (1956). Repeated Interviewing. *American Journal of Sociology*, *62*(2), 215–217.

Webster, J., & Watson, R. T. (2002). Analyzing the Past to Prepare for the Future: Writing a Literature Review. *MIS Quarterly*, *26*(2), xiii–xxiii.

Weick, K. E. (1989). Theory Construction as Disciplined Imagination. *The Academy of Management Review*, *14*(4), 516–531.

Whetten, D. A. (1989). What Constitutes a Theoretical Contribution? *The Academy of Management Review*, *14*(4), 490–495.

Williamson, I. O., King, J. E., Lepak, D., & Sarma, A. (2010). Firm Reputation, Recruitment Web Sites, and Attracting Applicants. *Human Resource Management*, *49*(4), 669–687.

Wirtky, T., Laumer, S., Eckhardt, A., & Weitzel, T. (2016). On the Untapped Value of e-HRM – a Literature Review. *Communications of the Association for Information Systems*, *38*, 20–83.

Wolffers, I. (1996). Confidentiality in Research. *The Lancet*, *347*(9001), 620–620.

Wolfswinkel, J. (2009). Reflecting on e-Recruiting Research: A Systematic Literature Review. *11th Twente Student Conference on IT, University of Twente.* Presented at the Twente Student Conference on IT, University of Twente, Netherlands.

Wolfswinkel, J., Furtmueller, E., & Wilderom, C. (2010). Reflecting on E-Recruiting Research Using Grounded Theory. *ECIS 2010 Proceedings*, 1–12. University of Pretoria, Pretoria, South Africa: Association for Information Systems.

Wooten, M. E., & Branch, E. H. (2012). Defining Appropriate Labor: Race, Gender, and Idealization of Black Women in Domestic Service. *Race, Gender & Class*, *19*(3/4), 292–308.

Xia, B. (2014). Digital Labour in Chinese Internet Industries. *TripleC: Communication, Capitalism & Critique*, *12*(2), 668–693.

Yoon Kin Tong, D. (2009). A Study of E-recruitment Technology Adoption in Malaysia. *Industrial Management & Data Systems*, *109*(2), 281–300.

Yu, L. (2011). The Divided Views of the Information and Digital Divides: A Call for Integrative Theories of Information Inequality. *Journal of Information Science*, *37*(6), 660–679.

Zigurs, I., & Buckland, B. K. (1998). A Theory of Task/Technology Fit and Group Support Systems Effectiveness. *MIS Quarterly*, *22*(3), 313–334.

Zimmer, M. (2010). "But the Data is Already Public": On the Ethics of Research in Facebook. *Ethics and Information Technology*, *12*(4), 313–325.

APPENDICES

Appendix A: List of Participants

i) Jobseekers

	Pseudonym (Code Name)	Participant's Town of Origin	Number of Interviews Taped	Date	Number of Interviews without Taping	Date
1	Vekarapi	Windhoek			1	2/3/2015
2	Casper	Tsumeb	1	17/3/15	1	28/5/15
3	Quinton	Keetmashop	0		1	15/6/15
4	Loice	Ondangwa	0		1	23/4/15
5	John	Rundu	0		1	12/5/2015
6	Hangula	Ondangwa	0		1	19/5/15
7	Saara	Swakopmund	1	18/3/15	0	
8	Kauna	Oshakati	1	2/4/2015	0	
9	Kandombo	Ondangwa	1	10/4/2015	0	
10	Josephine	Otjiwarongo	2	29/4/15, 30/4/15	1	27/5/15
11	Shivute	Oshakati	2	10/10/15, 30/4/15	1	1/6/2015
12	Mandume	Gobabis	2	30/4/15, 26/10/15	0	
13	Penehafo	Otjiwarongo	1	2/5/2015	1	1/6/2015
14	shilongo	Tsumeb	1	5/5/15,	1	2/6/2015
15	Kazembiri	Rundu	1	5/5/2015	0	
16	Amukwaya	Windhoek	2	6/5/15, 21/10/15	1	3/6/2015
17	Kapenda	Katima Mulilo	2	7/5/15, 20/10/15	1	15/6/15
18	Lizel	Walvis Bay	1	30/4/15	1	27/5/15
19	Koch	Swakopmund	1	8/5/2015	0	
20	Ndapewa	Otjiwarongo	2	20/10/15, 21/10/15	1	3/6/2015
21	Peneyambeko	Ondangwa	1	21/10/15	1	3/6/2015
22	Paulina	Tsumeb	1	26/10/15	0	
23	Hafeni	Ongwediva	1	20/10/15	0	
24	Ndilinawa	Tsumeb	1	20/10/15	1	4/6/2015
25	Namupala	Otjiwarongo	2	20/10/15, 20/10/15	1	4/6/2015
26	Hailonga	Ondangwa	1	27/10/15	1	15/6/15
27	Shakela	Oshakati	1	27/10/15	0	
TOTAL			**29**		**18**	
GRAND TOTAL			**47**			

ii) Recruitment Agencies

	Pseudonym (Contact Person's Pseudonym)	Head Office	Number of Interviews without Taping	Date
1	Posh (Loini, Judith)	Windhoek	2	29/7/15, 18/8/15
2	DevSite	Unknown	0	N/A
3	Talent Scout (Sheron)	Windhoek	1	11/8/2015

Appendix B: Excerpt of Notes Written after a Meeting

Pseudonym: *Vekarapi*

Gender: *Male*

Origin: *Windhoek*

Emp. Status: *Employed. Looking for better positions.*

Education and Skills: *PhD*

Medium of Interviewing: *Phone*

Date: 2/03/2015

Interviewer: *Say something about your job seeking experience.*

Vekarapi: *My friend, I have looked for employment for a long time in different places-North, South, East and West. I have been fortunate at times but as I continued increasing the chances of being fortunate by bettering my qualifications I started being fortunate most of the times.*

I have sat down and wrote applications on paper by hand. There is no backspace when you are writing by hand – you have to start everything over when you make a typo. But now, in this era of information technology if the job requires that I hand-write my cover letter, my interest in that job is tempered. This is the digital era. But at the same time I would be interested to see people's faces in interviews.

Interviewer: *So are you saying there are some aspects of electronic recruitment that you are not comfortable with?*

Vekarapi: *Yes. I have uploaded CV's on websites and in many cases no acknowledgement came my way. That is not what I want. It is difficult to even know if anyone looks at those CVs and cover letters which people upload. I then have to call some contact number given on the website only to be told, "Don't*

worry sir, will get in touch with you.". At that I appreciate some of the ways of the past, which I can combine with new information technology to ensure my application reaches its destination.

Interviewer: *How do you combine them?*

Vekarapi: *At times when it is imperative that I get my application to the desired destination, I send it by courier and track the it online. Online I can see where the application documents are and when they get to the destination I see who received them. I can then call in later days enquiring about the application and when I call I can always ask to talk to the person who received my application by name. Putting a face or name to who you are talking to helps a lot.*

Interviewer: *How does putting a face or name help?*

Vekarapi: *It's a psychological thing or maybe it is momentum from the past. I find that when you call upon an individual by name, they tend to be helpful depending on how courteous you are. Maybe it is just me but sometimes I want to meet the responsible people in person. A handshake may encourage them to call you for an interview. Those are my thoughts. Or sometimes by direct physical contact I get to read the result of the application, I get to see the 'chemistry'. At times I notice that there is no hope for me on a particular vacancy after meeting the recruiting individuals. It's all about reading people and seeing if they like you or if you like them.*

Interviewer (Q8): *Have you ever enlisted the services of recruitment agencys?*

Vekarapi: *Sure Mike. You know that when one is looking for a job one uses as many strategies as possible. Those guys also give tips on many other aspects of the job seeking process like how to conduct oneself in an interview. Also, some of them have personal contacts within client organizations which may turn out to be to the candidate's advantage because they represent the candidate to the client. Some jobs will not appear anywhere else except on employment agencys' websites, so I go there. At times they post such vacancies in newspapers but they still require you to visit their website. They know some of us read real old style newspapers* (paper-based as opposed to online) *so they also put the adverts there.*

Appendix C: Sample Memos

i. Memo on Exploring the Use of Depth-First Search Algorithm as a Strategy in GTM (15/4/2015)

Taking vertices to represent concepts relevant to the developing theory. An algorithm for the depth-first search (DFS) algorithm on a graph G (structure of connected concepts) of relevant concepts can be written in exactly the common way depth-first search (DFS) is usually defined. See below.

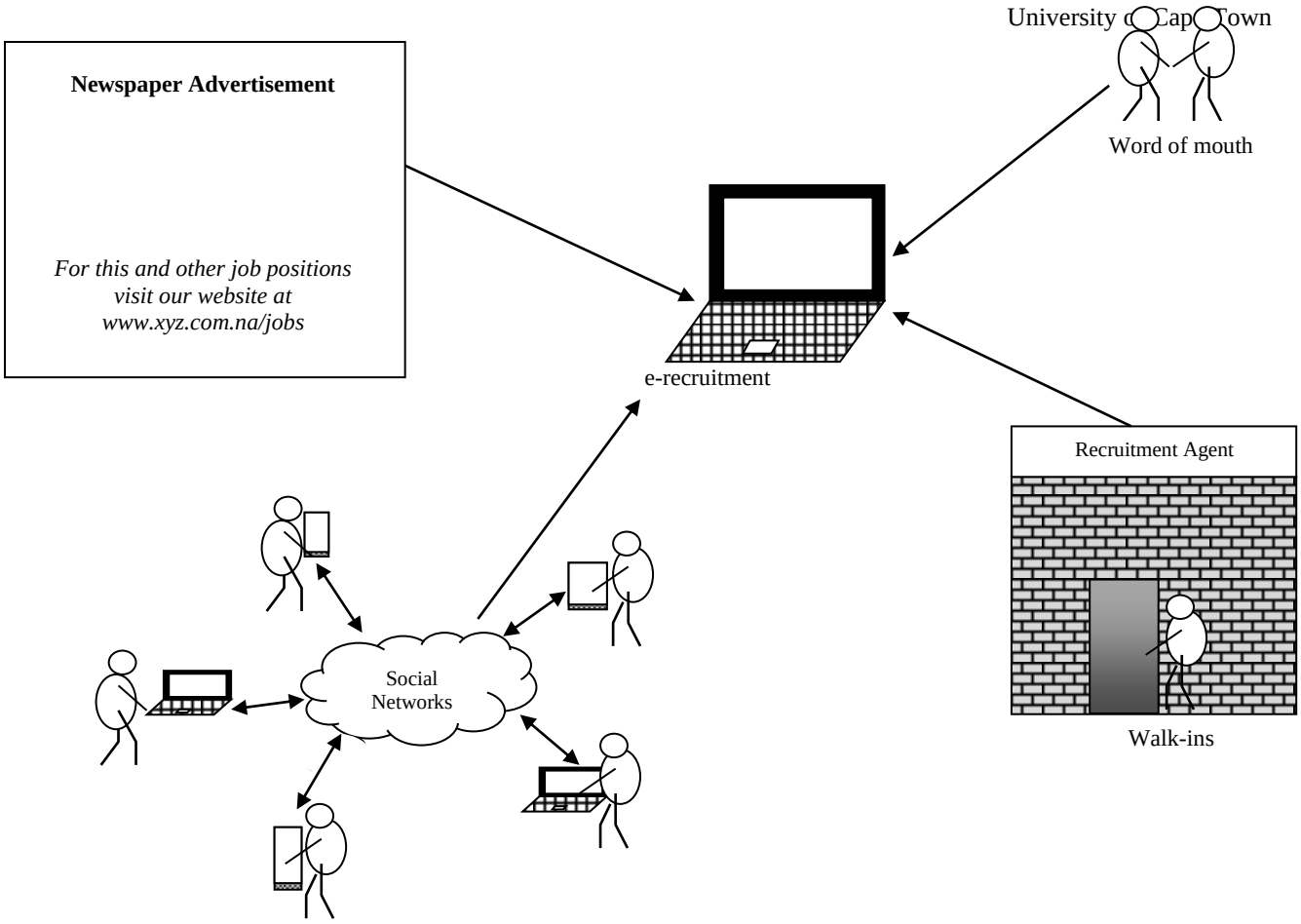
```
DFS(G,v) //v is the vertex where the search starts and G is the
         //graph of concepts
         Stack S := {}; //starting with an empty stack
         for vertex u, set visited[u] := false;
         push S, v;
         while (S is not empty){//start loop
            u := pop S;
            if (not visited[u]) then
               visited[u] := true;
               for each unvisited neighbour w of u
                  push S, w;
            end if
         }//end loop
      END DFS()
```

Just as it is sometimes useful to keep track of the edges used to visit the vertices, it is essential to also note edges (relationships) between vertices since these edges would span the vertices visited as they do so tell a story of the developing theory. At the end of the traversal I end up with a structure telling the story of behind the behavior of participants in the substantive area.

The advantage of this approach would be that it encourages theoretical coding as the researcher establishes theoretical codes on the go and also reduces the amount of memo sorting necessary as relevant memos are likely to follow the developing story.

ii. Excerpt from Memo on Redirecting/Channelling (11/7/2015)

In the context of this study *channelling* means to direct towards a particular end or object. In this study interaction was being redirected from one interaction medium to another e.g. newspaper to online. Through face-to-face interaction recruitment participants were directed online, and from social networking platforms recruitment participants were directed to online recruitment systems. Also, there are incidents in which *channelling* directed online recruitment participants from online recruitment systems to offline recruitment systems. Figure below captures the technique of channelling and some of the phenomena that participate in channelling.

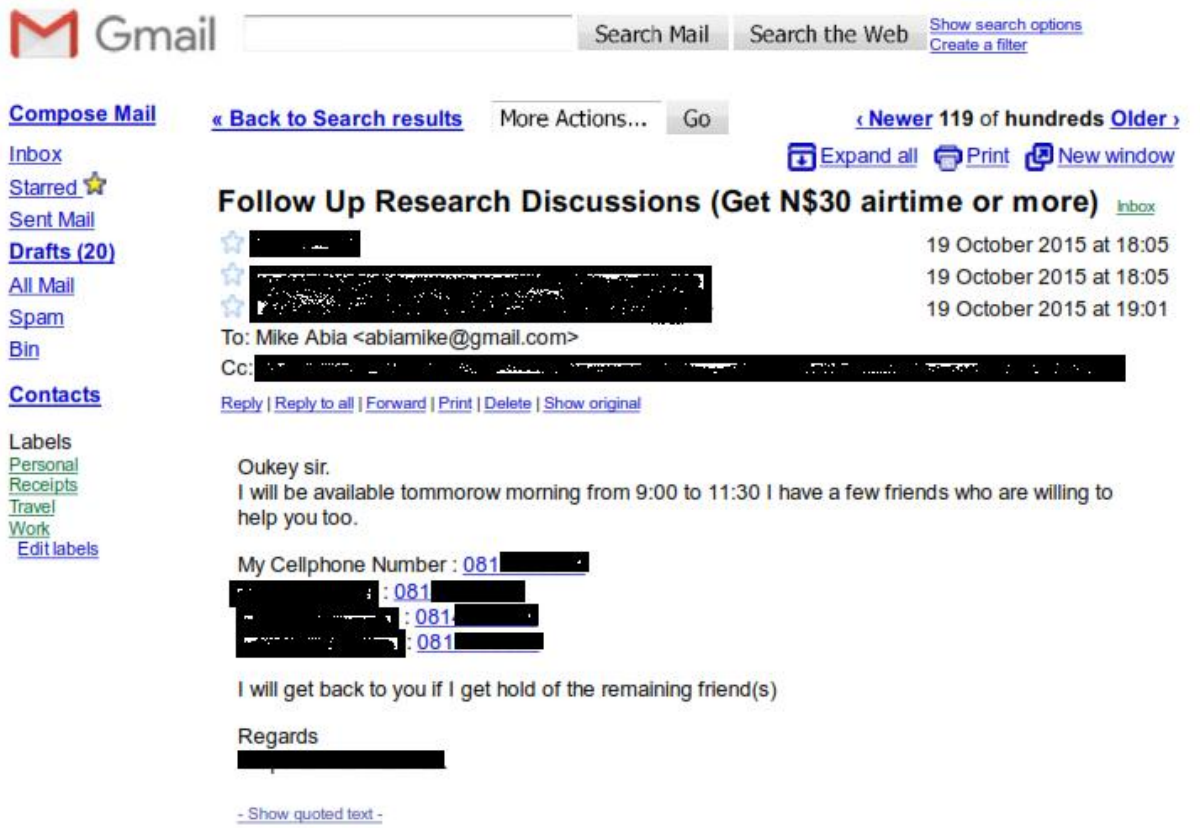


The reasons for *channelling* are diverse. Participants in the research considered recruitment approaches that were most favourable to them in deciding on *channelling*. Online recruitment phenomenon was cheap for the respondents but sometimes it needed participants to be channelled from their familiar traditional offline recruitment phenomenon. Recruitment agencys posted job positions in newspapers with the least possible details and made sure to refer the interested part to their website for comprehensive details. This was because newspapers were much more expensive to communicate through than the recruitment agencys' own websites. On the other hand, candidates marketed themselves in newspapers aside from having prevailing online presence in order to increase the chances of getting employment and hence free themselves from the confines of the recruitment phenomenon.

Appendix D: Protocol for Observation of Participants

Date of Visit	
Participant ID	
Location	
Visibility	
Layout of Location	
Accessibility of Location	
Activities Observed	
Online Activities	
Other	

Appendix E: Sample email Communication



Gmail Search Mail Search the Web Show search options Create a filter

Compose Mail
Inbox
Starred
Sent Mail
Drafts (20)
All Mail
Spam
Bin
Contacts
Labels
Personal
Receipts
Travel
Work
Edit labels

« Back to Search results More Actions... Go ‹ Newer 119 of hundreds Older ›

Expand all Print New window

Follow Up Research Discussions (Get N$30 airtime or more) Inbox

[redacted] 19 October 2015 at 18:05
[redacted] 19 October 2015 at 18:05
19 October 2015 at 19:01

To: Mike Abia <abiamike@gmail.com>
Cc: [redacted]

Reply | Reply to all | Forward | Print | Delete | Show original

Oukey sir.
I will be available tommorow morning from 9:00 to 11:30 I have a few friends who are willing to help you too.

My Cellphone Number : 081[redacted]
[redacted] : 081[redacted]
[redacted] : 081[redacted]
[redacted] : 081[redacted]

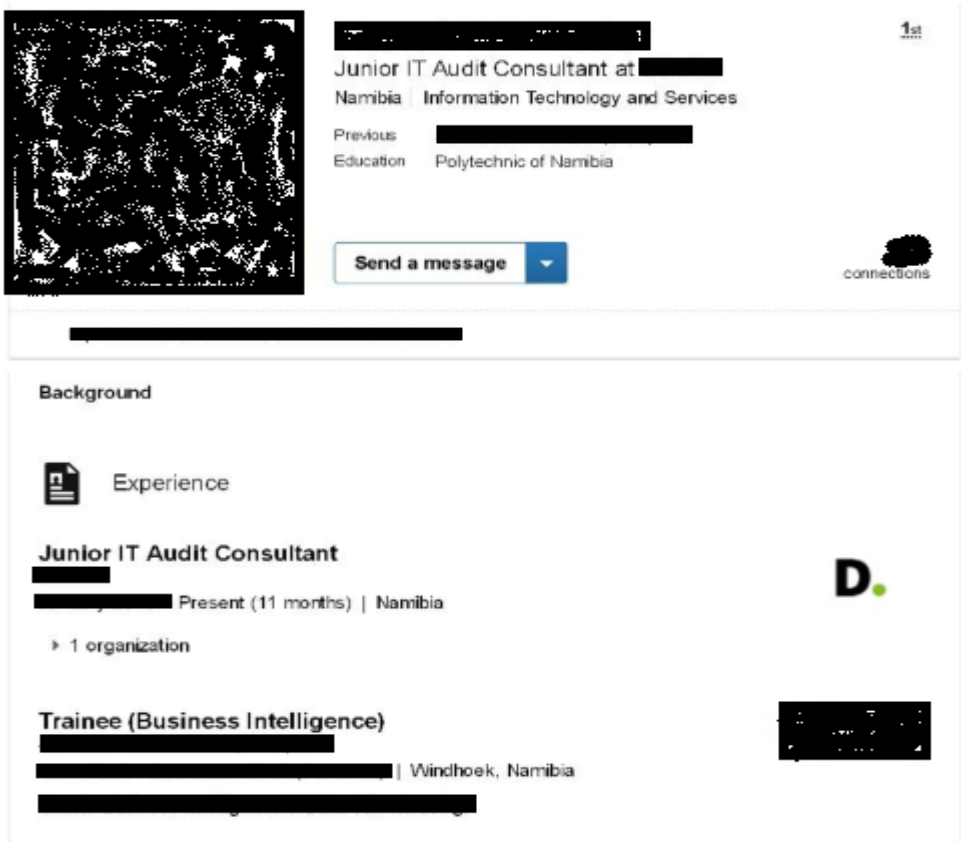
I will get back to you if I get hold of the remaining friend(s)

Regards
[redacted]

- Show quoted text -

Appendix F: Sample Online Jobseeker Profile

Mandume's LinkedIn Profile

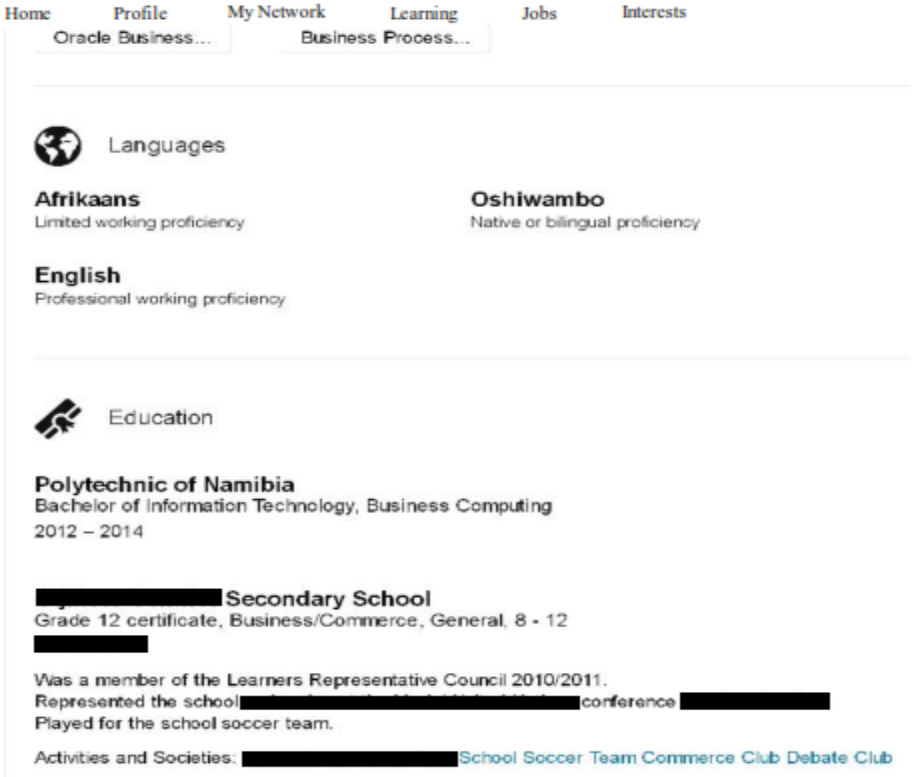


Skills

Top Skills

9 Microsoft Office
5 Java
5 Microsoft Excel
4 SQL
4 Strategic Planning
2 Linux
1 Web Development
1 MySQL
WordPress
HTML5

[redacted] also knows about...



Home Profile My Network Learning Jobs Interests

Oracle Business... Business Process...

Languages

Afrikaans
Limited working proficiency

Oshiwambo
Native or bilingual proficiency

English
Professional working proficiency

Education

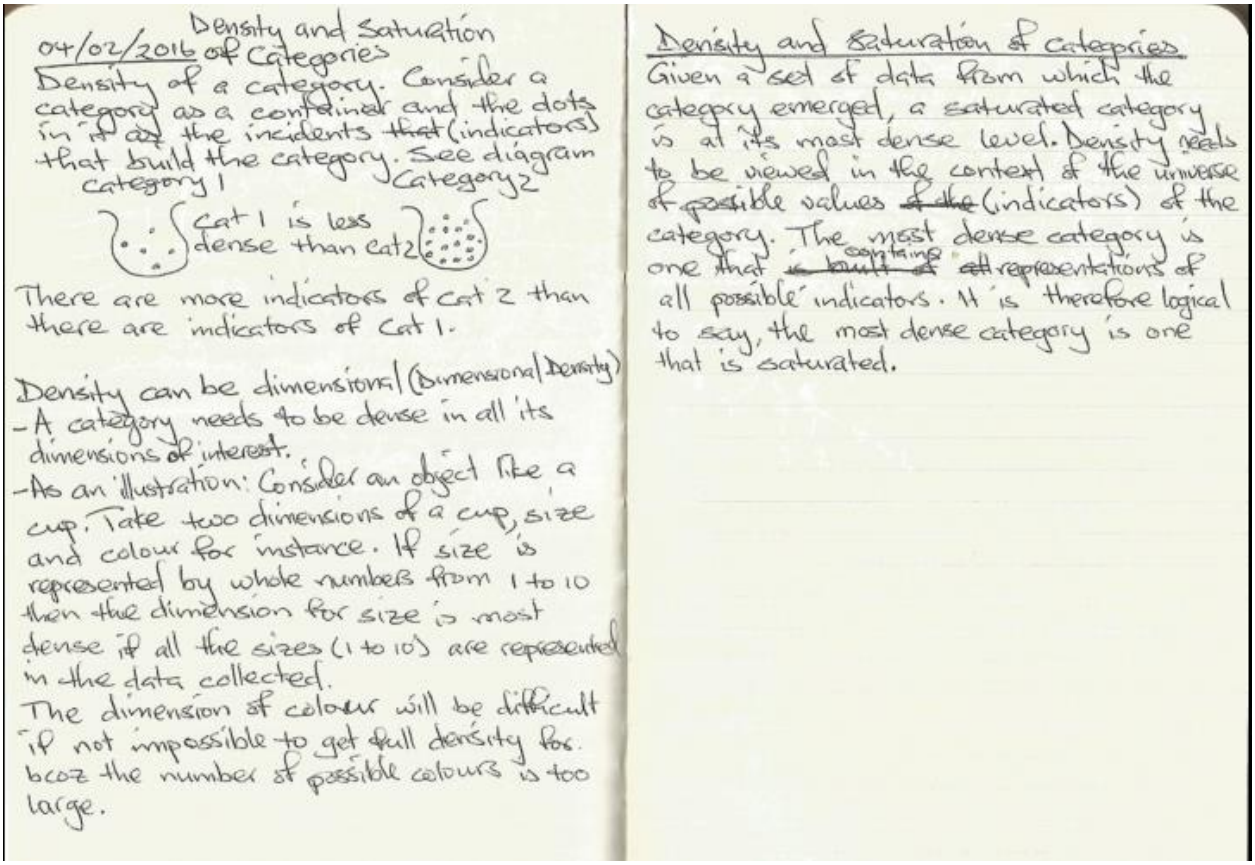
Polytechnic of Namibia
Bachelor of Information Technology, Business Computing
2012 – 2014

[redacted] **Secondary School**
Grade 12 certificate, Business/Commerce, General, 8 - 12
[redacted]

Was a member of the Learners Representative Council 2010/2011.
Represented the school [redacted] conference [redacted]
Played for the school soccer team.

Activities and Societies: [redacted] School Soccer Team Commerce Club Debate Club

Appendix G: Density and Saturation of a Category



04/02/2016 Density and Saturation of Categories

Density of a category. Consider a category as a container and the dots in it as the incidents ~~that~~ (indicators) that build the category. See diagram

Category 1 Category 2

Cat 1 is less dense than cat 2

There are more indicators of Cat 2 than there are indicators of Cat 1.

Density can be dimensional (Dimensional Density)
- A category needs to be dense in all its dimensions of interest.
- As an illustration: Consider an object like a cup. Take two dimensions of a cup, size and colour for instance. If size is represented by whole numbers from 1 to 10 then the dimension for size is most dense if all the sizes (1 to 10) are represented in the data collected.
The dimension of colour will be difficult if not impossible to get full density for. bcoz the number of possible colours is too large.

Density and Saturation of Categories

Given a set of data from which the category emerged, a saturated category is at its most dense level. Density needs to be viewed in the context of the universe of ~~possible~~ values ~~of the~~ (indicators) of the category. The most dense category is one ~~that is built of~~ containing ~~all~~ representations of all possible indicators. It is therefore logical to say, the most dense category is one that is saturated.

Appendix H: Coding Matrices on Jobseekers Data

i. Interpreting Fit

Interpreting Objects of Concern

		Interpreting Information Technology	Interpreting the Job	Interpreting Job Provider	Interpreting the Jobseeker
1	Amukwaya	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
2	Chris	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
3	Hafeni	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
4	Hailonga	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
5	Hangula	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
6	John	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information	job not fitting jobseeker perception. job does not fit jobseeker's	job provider wants to know. job provider is restricting. job provider is helpful. job provider	jobseeker is inexperienced

		Interpreting Information Technology	Interpreting the Job	Interpreting Job Provider	Interpreting the Jobseeker
		technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	wants.	biasing. job provider wanting experienced jobseekers.	
7	Josephine	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
8	Kandombo	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
9	Kapenda	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
10	Kauna	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
11	Kazembiri	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
12	Koch	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information	job not fitting jobseeker perception. job does	job provider wants to know. job provider is restricting. job provider	jobseeker is inexperienced

		Interpreting Information Technology	Interpreting the Job	Interpreting Job Provider	Interpreting the Jobseeker
		technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	not fit jobseeker's wants.	is helpful. job provider biasing. job provider wanting experienced jobseekers.	
13	Lizel	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
14	Loice	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
15	Mandume	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
16	Namupala	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
17	Ndapewa	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
18	Ndilinawa	traditional approach is inconvenient. information technology is fair. information	job not fitting jobseeker	job provider wants to know. job provider is	jobseeker is inexperienced

		Interpreting Information Technology	Interpreting the Job	Interpreting Job Provider	Interpreting the Jobseeker
		technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	perception. job does not fit jobseeker's wants.	restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	
19	Paulina	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
20	Penehafo	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
21	Peneyambeko	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
22	Quinton	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
23	Saara	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced

		Interpreting Information Technology	Interpreting the Job	Interpreting Job Provider	Interpreting the Jobseeker
24	Shakela	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
25	Shilongo	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
26	Shivute	traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced
27	Vekarapi	>>>>traditional approach is inconvenient. information technology is fair. information technology defines modernity. information technology use is convenient. information technology leads to traditional approaches. information technology-aided approach is viable. information technology helps recruitment. information technology use is convenient. information technology is efficient. information technology is restrictive. information technology is replacing traditional means.	job not fitting jobseeker perception. job does not fit jobseeker's wants.	job provider wants to know. job provider is restricting. job provider is helpful. job provider biasing. job provider wanting experienced jobseekers.	jobseeker is inexperienced

Tracking Objects of Concern

		Tracking Information Technology	Tracking the Job	Tracking Job Provider	Tracking the Jobseeker
1	Amukwaya	interpreting changes in information technologies. noting changing information technologies. Wishing for better information technologies.	moulding. observing changes in job requirements. networking.	perceiving trends in recruiters. networking.	following trends in job seeker job experience. following trends in job seeker job knowledge. following trends in job seeker skills.
2	Chris	interpreting changes in information technologies. noting changing information technologies. Wishing for better information technologies.	observing trends in job requirements. networking	networking. recycling.	following trends in job seeker job experience.

		Tracking Information Technology	Tracking the Job	Tracking Job Provider	Tracking the Jobseeker
3	Hafeni	interpreting changes in information technologies. noting changing information technologies. Wishing for better information technologies.	moulding. observing changes in job requirements. networking.	perceiving trends in recruiters. networking. Delegating.	following trends in job seeker job experience. following trends in job seeker job knowledge. following trends in job seeker skills.
4	Hailonga	observing improvements in technology. Interpreting changes in information technologies.	moulding. observing changes in job requirements. networking.	perceiving trends in recruiters. networking. Delegating.	following trends in job seeker job experience. following trends in job seeker job knowledge. following trends in job seeker skills.
5	Hangula	interpreting changes in information technologies. noting changing information technologies. Wishing for better information technologies.	observing trends in job requirements. networking	perceiving trends in recruiters. networking. Delegating.	following trends in job seeker job experience.
6	John	interpreting changes in information technologies. noting changing information technologies. Wishing for better information technologies.	observing trends in job requirements. predicting changes in job requirements. networking	perceiving trends in recruiters. networking. Delegating.	following trends in job seeker job experience.
7	Josephine	interpreting changes in information technologies. noting changing information technologies. Wishing for better information technologies.	moulding. observing changes in job requirements. networking.	perceiving trends in recruiters. networking. Delegating.	following trends in job seeker job experience.
8	Kandombo	interpreting changes in information technologies. noting changing information technologies. Wishing for better information technologies.	moulding. observing changes in job requirements. networking.	perceiving trends in recruiters. networking. Delegating.	following trends in job seeker job experience.
9	Kapenda	channelling to information technology. Moulding.	moulding. observing changes in job requirements. networking.	perceiving trends in recruiters. networking. Delegating.	following trends in job seeker job experience. following trends in job seeker job knowledge. following trends in job seeker skills.
10	Kauna	selecting information technology. job redirecting jobseeker to information technology.	moulding. observing changes in job requirements. networking.	perceiving trends in recruiters. networking. Delegating.	following trends in job seeker job experience.
11	Kazembiri	interpreting changes in information technologies. noting changing information technologies. Wishing for better information technologies.	moulding. observing changes in job requirements. networking.	networking. moulding.	following trends in needed jobseeker training (moulding).
12	Koch	interpreting changes in information technologies. noting changing information technologies. Wishing for better information technologies.	moulding. observing changes in job requirements. networking.	perceiving trends in recruiters. networking. Delegating.	following trends in job seeker job experience. following trends in job seeker job knowledge. following trends in job seeker skills.
13	Lizel	observing improvements in technology. Interpreting changes in information technologies.	moulding. observing changes in job requirements. networking.	perceiving trends in recruiters. networking. Delegating.	following trends in job seeker job experience. following trends in job seeker job knowledge. following trends in job seeker skills.
14	Loice	interpreting changes in information technologies. noting changing information technologies. Wishing for better information	observing trends in job requirements. networking	perceiving trends in recruiters. networking. Delegating.	following trends in job seeker job experience.

		Tracking Information Technology	Tracking the Job	Tracking Job Provider	Tracking the Jobseeker
		technologies.			
15	Mandume	job redirecting jobseeker to information technology	moulding. observing changes in job requirements. networking.	perceiving trends in recruiters. networking. Delegating.	following trends in needed jobseeker training (moulding). following trends in job seeker job experience.
16	Namupala	observing improvements in technology. Interpreting changes in information technologies.	moulding. observing changes in job requirements. networking.	perceiving trends in recruiters. networking. Delegating.	following trends in job seeker job experience. following trends in job seeker job knowledge. following trends in job seeker skills.
17	Ndapewa	interpreting changes in information technologies. noting changing information technologies. Wishing for better information technologies.	moulding. observing changes in job requirements. networking.	perceiving trends in recruiters. networking. Delegating.	following trends in job seeker job experience. following trends in job seeker job knowledge. following trends in job seeker skills.
18	Ndilinawa	observing improvements in technology. Interpreting changes in information technologies.	moulding. observing changes in job requirements. networking.	perceiving trends in recruiters. networking. Delegating.	following trends in job seeker job experience. following trends in job seeker job knowledge. following trends in job seeker skills.
19	Paulina	interpreting changes in information technologies. noting changing information technologies. Wishing for better information technologies.	moulding. observing changes in job requirements. networking.	perceiving trends in recruiters. networking. Delegating.	following trends in job seeker job experience. following trends in job seeker job knowledge. following trends in job seeker skills.
20	Penehafo	interpreting changes in information technologies. noting changing information technologies. Wishing for better information technologies.	moulding. observing changes in job requirements. networking.	perceiving trends in recruiters. networking. Delegating.	following trends in needed jobseeker training (moulding). following trends in job seeker job experience.
21	Peneyambeko	interpreting changes in information technologies. noting changing information technologies. Wishing for better information technologies.	moulding. observing changes in job requirements. networking.	networking. moulding.	following trends in job seeker job experience. following trends in job seeker job knowledge. following trends in job seeker skills.
22	Quinton	interpreting changes in information technologies. noting changing information technologies. Wishing for better information technologies.	observing trends in job requirements. networking	perceiving trends in recruiters. networking. Delegating.	following trends in needed jobseeker training (moulding). following trends in job seeker job experience.
23	Saara	interpreting changes in information technologies. noting changing information technologies. Wishing for better information technologies.	observing trends in job requirements. networking	perceiving trends in recruiters. networking. Delegating.	following trends in job seeker job experience.
24	Shakela	observing improvements in technology. Interpreting changes in information technologies.	moulding. observing changes in job requirements. networking.	perceiving trends in recruiters. networking. Delegating.	following trends in job seeker job experience. following trends in job seeker job knowledge. following trends in job seeker skills.
25	Shilongo	interpreting changes in information technologies. noting changing information technologies. Wishing for better information technologies.	moulding. observing changes in job requirements. networking.	perceiving trends in recruiters. networking. Delegating.	following trends in needed jobseeker training (moulding). following trends in job seeker job experience.
26	Shivute	interpreting changes in information technologies.	moulding. observing changes in job	perceiving trends in	following trends in needed jobseeker training

		Tracking Information Technology	Tracking the Job	Tracking Job Provider	Tracking the Jobseeker
		noting changing information technologies. Wishing for better information technologies.	requirements. networking.	recruiters. networking. Delegating.	(moulding). following trends in job seeker job experience.
27	Vekarapi	noting the necessity of information technology. selecting information technology.	observing trends in job requirements. networking	perceiving trends in recruiters. networking. Delegating.	following trends in job seeker job experience.

ii. Positioning for Fit

Seeking a Position

		Waving a Placard	Requesting for a Position
1	Amukwaya		solicited requesting for a position. unsolicited requesting for a position
2	Chris	signalling current position. signalling current employment recruitment expectations. signalling expectations about information technology.	solicited requesting for a position. unsolicited requesting for a position
3	Hafeni		solicited requesting for a position.
4	Hailonga		solicited requesting for a position. unsolicited requesting for a position
5	Hangula	signalling current position. signalling current employment recruitment expectations. signalling expectations about information technology.	solicited requesting for a position. unsolicited requesting for a position
6	John	signalling current position. signalling current employment recruitment expectations. signalling expectations about information technology.	solicited requesting for a position. unsolicited requesting for a position
7	Josephine	signalling current position. signalling current employment recruitment expectations. signalling expectations about information technology.	solicited requesting for a position. unsolicited requesting for a position
8	Kandombo	signalling current position. signalling current employment recruitment expectations. signalling expectations about information technology.	solicited requesting for a position. unsolicited requesting for a position
9	Kapenda		solicited requesting for a position. unsolicited requesting for a position
10	Kauna	signalling current position. signalling current employment recruitment expectations. signalling expectations about information technology.	solicited requesting for a position. unsolicited requesting for a position
11	Kazembiri		solicited requesting for a position. unsolicited requesting for a position
12	Koch		solicited requesting for a position.
13	Lizel		solicited requesting for a position. unsolicited requesting for a position
14	Loice	signalling current position. signalling current employment recruitment expectations. signalling expectations about information technology.	solicited requesting for a position. unsolicited requesting for a position
15	Mandume	signalling current position. signalling current employment recruitment expectations. signalling expectations about information technology.	solicited requesting for a position. unsolicited requesting for a position
16	Namupala		solicited requesting for a position. unsolicited requesting for a position
17	Ndapewa		solicited requesting for a position.
18	Ndilinawa		solicited requesting for a position. unsolicited requesting for a position.
19	Paulina		solicited requesting for a position.
20	Penehafo	notifying and updating	solicited requesting for a position. unsolicited requesting for a position
21	Peneyambeko		solicited requesting for a position.
22	Quinton	signalling current position. signalling current employment recruitment expectations. signalling	solicited requesting for a position. unsolicited requesting for a position

		Waving a Placard	Requesting for a Position
		expectations about information technology.	
23	Saara	signalling current position. signalling current employment recruitment expectations. signalling expectations about information technology.	solicited requesting for a position. unsolicited requesting for a position
24	Shakela		solicited requesting for a position. unsolicited requesting for a position
25	Shilongo		solicited requesting for a position. unsolicited requesting for a position
26	Shivute	signalling current position. signalling current employment recruitment expectations. signalling expectations about information technology.	solicited requesting for a position. unsolicited requesting for a position
27	Vekarapi	signalling current position. signalling current employment recruitment expectations. signalling expectations about information technology.	solicited requesting for a position. unsolicited requesting for a position

Registering a Position

		Registering Cyber-Position	Registering a Physical Position	Registering a Psychological Position
1	Amukwaya	registering on mobile network	relocating.	cyber communication with job providers. Non-cyber communication with job providers.
2	Chris	registering on mobile network	notifying of physical address	cyber communication with job providers. Non-cyber communication with job providers.
3	Hafeni	registering on mobile network	relocating.	cyber communication with job providers. Non-cyber communication with job providers.
4	Hailonga	registering on mobile network	notifying of physical address	cyber communication with job providers. Non-cyber communication with job providers.
5	Hangula	registering on mobile network	notifying of physical address	cyber communication with job providers. Non-cyber communication with job providers.
6	John	registering on mobile network	notifying of physical address	cyber communication with job providers. Non-cyber communication with job providers.
7	Josephine	registering on mobile network	relocating.	cyber communication with job providers. Non-cyber communication with job providers.
8	Kandombo	registering on professional network	relocating.	cyber communication with job providers. Non-cyber communication with job providers.
9	Kapenda	registering on social networks. registering on professional network. registering on mobile network.	relocating. Visiting a place.	cyber communication with job providers. Non-cyber communication with job providers.
10	Kauna	registering on mobile network	relocating.	cyber communication with job providers. Non-cyber communication with job providers.
11	Kazembiri	registering on mobile network	notifying of physical address	cyber communication with job providers. Non-cyber communication with job providers.
12	Koch	registering on mobile network	notifying of physical address	cyber communication with job providers. Non-cyber communication with job providers.
13	Lizel	registering on mobile network	notifying of physical address	cyber communication with job providers. Non-cyber communication with job providers.
14	Loice	registering on mobile network	notifying of physical address	cyber communication with job providers. Non-cyber communication with job providers.
15	Mandume	registering on professional network. registering on mobile network	notifying of physical address	cyber communication with job providers. Non-cyber communication with job providers.
16	Namupala	registering on mobile network	notifying of physical address	cyber communication with job providers. Non-cyber communication with job providers.
17	Ndapewa	registering on mobile network	notifying of physical address	cyber communication with job providers. Non-cyber communication with job providers.
18	Ndilinawa	registering on mobile network	notifying of physical address	cyber communication with job providers. Non-cyber communication with job providers.
19	Paulina	registering on mobile network	notifying of physical address	cyber communication with job providers. Non-cyber communication with job providers.
20	Penehafo	registering on mobile network	relocating.	cyber communication with job providers. Non-cyber communication with job providers.
21	Peneyambeko	registering on mobile network	relocating.	cyber communication with job providers. Non-cyber communication with job providers.
22	Quinton	registering on professional network. registering on mobile network	notifying of physical address	cyber communication with job providers. Non-cyber communication with job providers.
23	Saara	registering on professional network	notifying of physical address	cyber communication with job providers. Non-cyber communication with job providers.

24	Shakela	registering on mobile network	notifying of physical address	cyber communication with job providers. Non-cyber communication with job providers.
25	Shilongo	registering on job provider websites. registering on mobile network.	relocating.	cyber communication with job providers. Non-cyber communication with job providers.
26	Shivute	registering on mobile network	notifying of physical address	cyber communication with job providers. Non-cyber communication with job providers.
27	Vekarapi	registering on mobile network	notifying of physical address	cyber communication with job providers. Non-cyber communication with job providers.

Affirming a Position

		Waving a Placard	**Networking**
1	Amukwaya	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
2	Chris	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
3	Hafeni	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
4	Hailonga	signalling unchanged position. notifying and updating.	communicating. Connecting.
5	Hangula	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
6	John	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
7	Josephine	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
8	Kandombo	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
9	Kapenda	signalling unchanged position. notifying and updating.	communicating. Connecting.
10	Kauna	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
11	Kazembiri	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
12	Koch	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
13	Lizel	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
14	Loice	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
15	Mandume	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
16	Namupala	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
17	Ndapewa	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
18	Ndilinawa	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
19	Paulina	signalling unchanged position. notifying and updating.	communicating. Connecting.
20	Penehafo	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
21	Peneyambeko	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
22	Quinton	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
23	Saara	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
24	Shakela	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
25	Shilongo	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
26	Shivute	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.
27	Vekarapi	signalling unchanged position. notifying and updating.	communicating. requesting connection. Connecting.

Appendix I: Coding Matrices on Recruitment Agencies Data

i. Interpreting Fit

Interpreting Objects of Concern

		Interpreting Information Technology	Interpreting the Job	Interpreting the Client	Interpreting the Candidate	Interpreting the Recruitment Agency
1	DevSite	information technology is efficient. information technology gives freedom. information technology is trendy. information technology is taking over recruitment activities.	evaluating the job.	understanding the client. fitting the client.	describing candidates. matching candidates with clients. identifying candidates' needs. distinguishing candidates.	recruitment agency competing.
2	TalentScout	information technology is efficient. information technology is convenient. describing information technology. information technology is an aiding tool. information technology is trendy. information technology is taking over recruitment activities.	understanding the job. representing the job. contextualising the job. job fits social media advertising. job is attractive.	understanding the client. fitting the client.	identifying the candidate. describing the candidate. distinguishing candidates. candidates have technical knowledge. identifying candidate.	recruitment agency competing. recruitment agency facilitating recruitment. recruitment agency personalising recruitment. recruitment agency provides choices. recruitment agency facilitating recruitment.
3	Posh	information technology is efficient. information technology is convenient. describing information technology. information technology is ineffective. information technology is preferable. information technology is sufficient. information technology is an aiding tool. information technology is trendy. information technology is taking over recruitment activities.	contextualising the job.	understanding the client.	describing candidates. matching candidates with clients. identifying candidates' needs. distinguishing candidates.	recruitment agency facilitating recruitment. recruitment agency facilitating recruitment. recruitment agency modernising. recruitment agency blending means.

Tracking Objects of Concern

		Tracking Information Technology	Tracking the Job	Tracking the Client	Tracking the Candidate	Tracking the Recruitment Agency
1	DevSite	shifting to technology, blending, exploring alternative technologies, noting technology	networking. recycling jobs. moulding.	recycling	networking. attracting candidates. selecting suitable candidates.	following delimits on geography. following agency's service goals. following agency's technology philosophy. following agency's networking goals.
2	TalentScout	shifting to technology, blending, exploring alternative technologies, noting technology	networking. aligning with job.	networking	networking. attracting candidates. selecting suitable candidates.	following delimits on geography. following agency's service goals. following agency's technology philosophy. following agency's networking goals.
3	Posh	shifting to technology, blending, exploring alternative technologies, noting technology	networking. moulding.	networking	networking. inviting candidates. attracting candidates. selecting suitable candidates.	following delimits on geography. following agency's service goals. following agency's technology philosophy. following agency's networking goals.

ii. Positioning for Fit

Seeking a Position

		Advertising	Networking
1	DevSite	incentivising for a position. networking for a position.	communicating. conferring.
2	TalentScout	incentivising for a position. wooing for a position.	communicating. conferring.
3	Posh	networking for a position.	communicating. conferring.

Registering a Position

		Registering Cyber-Position	Registering a Physical Position	Registering a Psychological Position
1	DevSite	creating online account. Publishing	acquiring physical space. publishing physical space.	claiming expertise. comparing agains competitors. claiming attractiveness. advertising.
2	TalentScout	creating online account.	acquiring physical space. publishing physical space.	claiming expertise. comparing agains competitors. claiming attractiveness. advertising.
3	Posh	creating online account. Publishing	acquiring physical space. publishing physical space.	claiming expertise. comparing agains competitors. claiming attractiveness. advertising.

Affirming a Position

		Publicising Occupancy of Position	Protecting a Position
1	DevSite	publishing position details. distributing position details.	serving satisfactorily. concealing access. securing a position.
2	TalentScout	publishing position details. distributing position details.	serving satisfactorily. concealing access. securing a position.
3	Posh	distributing position details. networking.	serving satisfactorily. concealing access. securing a position.

Appendix J: Ethics Approval

UNIVERSITY OF CAPE TOWN

Faculty of Commerce
Ethics in Research Committee
Courier: Room 2.21 Leslie Commerce Building Upper Campus University of Cape Town
Post: University of Cape Town • Private Bag • Rondebosch 7701
Email: Irwin.brown@uct.ac.za
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November 20, 2014

Mike Abia
Information Systems

Project title:

Main Concerns with Online Recruitment Information Systems: Perspectives from Job Seekers and Recruitment Agencies in Namibia

Dear Researcher,

This letter serves to confirm that this project as described in your submitted protocol has been approved.

Please note that if you make any substantial change in your research procedure that could affect the experiences of the participants, you must submit a revised protocol to the Committee for approval.

Regards,

Professor Harold Kincaid

Signature Removed

Commerce Faculty Ethics in Research Committee

"OUR MISSION is to be outstanding teaching and research university, educating for life and addressing the challenges facing our society."

Appendix K: E-recruitment Literature

i. Overview of the Literature Review Process Based on GTM

The flowchart in Figure 72 gives an outline of the literature review process as conducted in this research.

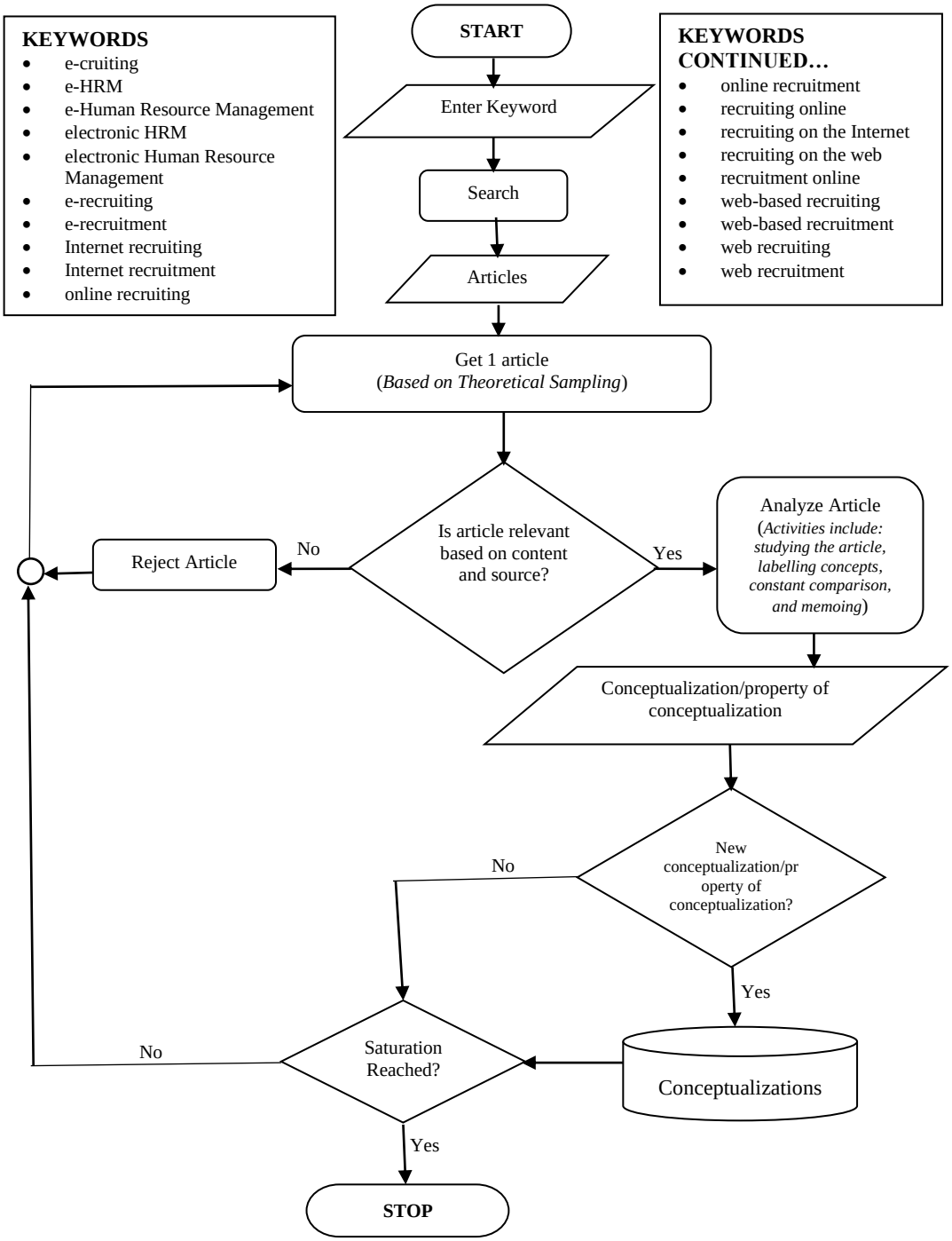

Figure 72: Literature Review Based on GTM

Further details of the process of reviewing literature using GTM in this study are given in subsequent sections of this appendix.

ii. Search for Articles

In order to be considered for this review a paper had to be published in a peer reviewed high ranking journal (by impact factor) in Information Systems (IS) or related fields like Human Resources, Social Sciences, Psychology, etc. Because there is so much literature on e-recruitment, I decided to automate some of the activities during the search and selection process. I used the web search engine (Google Scholar) and other tools to search electronically for the articles. I fed keywords relevant to e-recruitment to the searching tools for them to do the search based on the words. Many of the keywords were adopted from Wolfswinkel et al.'s, (2010) work and they are given in Figure 72, which also presents steps followed in the search and sampling of relevant research articles. After initial automated search on www.googlescholar.com and filtering of articles for relevancy based on title I had almost 500 journal articles, conference papers, etc. and I further filtered these articles based on their journal of origin and content. I had a basket of more than 145 high ranking journals and any article in one of the journals and with relevant content was selected. I included the South African Journal of Information Management, South African Journal of Human Resource Management and Electronic Journal of Information Systems in Developing Countries because of their contextual uniqueness than any other literature source. They are focused on developing country environments. The search process provided a set of many articles, but it did not qualify all of them as useful for the review. The selection process had to take place to sample useful and relevant articles for the review.

I do not claim to have extracted all articles on e-recruitment from the chosen journals, but I have a fairly representative sample for the purpose of the review, which is to conceptualise e-recruitment and later on determine the role of IT artefacts in e-recruitment.

iii. Theoretical Sampling of Articles

This study set out to identify all possible conceptualizations of e-recruitment regard-less of the number of research papers analyzed. Therefore, ideally all papers on e-recruitment needed to be included in the review. Alternatively, papers included in the analysis had to be a representative sample of all papers in e-recruitment that were relevant for the developing conceptualizations. However with the vast amount of research in e-recruitment it would be difficulty or extremely time consuming to in-clude all relevant e-recruitment research articles for the review. The alternative of having a representative sample is viable and using GTM's theoretical sampling was feasible for the objectives of this research to be met.

Sampling of research articles was based on two criteria in order to ensure relevancy of the articles to the review. Firstly, the article had to be in the field of e-recruitment regardless of discipline (Information Systems, Human Resource Management, Sociology, etc.). Secondly, the article had to be "picked" based on the developing concep-tualizations. The second criterion is based on the definition of theoretical sampling by Glaser & Strauss, (1967) that presents it as data collection with joint coding and analysis of data and making decisions on the data to collect next and where to find it.

The initial decision on sampling of articles was based on finding an article that met the first criterion. This logical approach is in line with practice in GTM (Glaser, 1978), where theoretical sampling is based on concepts relevant to the study. This approach coin-cided with Glaser's (1978, p. 40) guidance on how to determine the next set of data to collect using theoretical sampling. By and by, theoretical sampling was performed until all the conceptualizations got saturated and the conceptualization completed.

Saturation and Completeness. Glaser (1998) defined saturation as a state where new data does not bring new properties to the concepts. In an effort to attain complete-ness a check was done to make sure all conceptualizations were included.

End of Theoretical Sampling. Theoretical sampling ended when saturation and com-pleteness was achieved. It is noted that by following theoretical sampling, the goal was to consider articles in the population that one was directed to by the emerging conceptualizations and at the end have a representative sample. An un-representative sample will likely invite questions related to saturation and completeness.

Results of Theoretical Sampling. Theoretical sampling ended when saturation and completeness were achieved. This is the point at which the number of research arti-cles involved in identifying conceptualizations in e-recruitment were counted. In the end 26 research articles were relevant for identifying and explaining conceptualiza-tions of e-recruitment. Table 24 gives the articles sampled for this study together with their source journals.

Journal	Number of Articles	Articles
Communications of the ACM	3	Lee, (2007); Smyth, (2002); Wirtky et al. (2016)
Computer Fraud & Security	1	Vidros et al., (2016)
Decision Support Systems	1	Lee, (2011)
European Journal of Work and Organizational Psychology	1	Ehrhart et al., (2012)
Human Resource Management	1	Feldman & Klass, (2002)
Human Resource Management Journal	1	Parry & Tyson, (2008)
Industrial Management & Data Systems	1	Yoon Kin Tong, (2009)
International Journal of Selection and Assessment	7	Bartram, (2000); Braddy et al., (2009); Garcia-Izquierdo et al., (2010) ; Kashi & Zheng, (2013) ; Selden & Orenstein, (2011); Sylva & Mol, (2009); Van Hoye & Lievens, (2007)
Internet Research	2	Faliagka et al., (2012); Jansen et al., (2005)
Online Information Review	2	Smith & Rupp, (2004); Wang & Guo, (2012)
Organizational Behavior and Human Decision Processes	1	Walker et al., (2011)
Review of Public Personnel Administration	1	Llorens (2011)
Social Science Computer Review	1	Braddy et al., (2003)
South African Journal of Information Management	1	Pavon & Brown, (2010)
South African Journal of Human Resource Management	2	Koch et al., (2018); Chiwara et al., (2017)

Table 24: Sample E-recruitment Articles and Source Journals

When an article was picked it was analysed instantly before theoretical sampling enabled the picking of the next article.

iv. Analyzing Articles

Analysis of the articles that let conceptualizations of e-recruitment emerge (see Figure 72) required that constant comparison be applied by comparing codes to codes and concepts to concepts to find and note their relationships and further develop the con-ceptualizations. The emerging conceptualizations served as a framework for further selection of articles and using systematic deduction from the emerging conceptualiza-tion possibilities and probabilities were determined to guide the next cycle of article selection. Memos were created to note the analysts' ideas. Memoed ideas also served to direct the analysts on the next article to sample.

Every sampled article was investigated for its perspective on the essence of e-recruitment or the most essential or most vital part that embodied the conceptualiza-tion of e-recruitment. The essence expressed in the article implied the perception at the least, otherwise it was the perception by itself. Indicators in the article brought forth the conceptualizations. The moment of departure from the analysis to getting another article for analysis came only after the article was fully analyzed.

v. Literature Found Irrespective of Source

Count	Cites	Authors	Title	Year	Source
1	13	MS O'Connell, D Doverspike, S Gillikin, JM Meloun	Computer anxiety: Effects on computerized testing and implications for e-cruiting	2001	Journal of e-Commerce and Psychology
2	506	S Strohmeier	Research in e-HRM: Review and implications	2007	Human Resource Management Review
3	30	E Furtmueller, C Wilderom, M Tate	Managing recruitment and selection in thedigital age: e-HRM and resumes	2011	Human Systems Management
4	0	CJ Hartwell	Social media and e-HRM	2018	e-HRM
5	9	A Holm	Virtual HRM: A case of e-recruitment	2009	Proceedings of the 3rd International Workshop on Human Resource Information Systems - HRIS 2009
6	11	MR Olivas-LujÃ¡n, DM Rousseau	Can the Evidence-Based Management Movement Help e-HRM Bridge the Research-Practice Gap?	2010	Proceedings of the Third European Academic Workshop on electronic Human Resource Management
7	7	P Kaur	E-HRM: A Boon or Bane?	0	0
8	2	S Strohmeier, A Diederichsen	Evidence-Based e-HRM? On the way to rigorous and relevant research	2010	Proceedings of the Third European Academic Workshop on electronic Human Resource Management
9	1	H Peretz, E Parry	Impact of National Culture on the Use and Outcomes of E-HRM	2016	Academy of Management Proceedings

10	1	EO Sylvester, AD Bamidele, OS.Oluyemi	Implementing E-HRM System in Developing Countries: Challenges and Prospects	2015	International Journal of Applied Information Systems
11	1	E Galanaki, A Lazazzara, E Parry	A Cross-National Analysis of E-HRM Configurations: Integrating the Information Technology and HRM Perspectives	2019	Organizing for Digital Innovation
12	1	S Strohmeier	Technology, Functionality, and Applicability of Portals in E-HRM	2009	Information Systems: Challenges in e-HRM
13	1	B Dosajh, MP Sujlana	New e-HRM Model Based on Technology Acceptance Model	2012	Gian Jyoti E-Journal
14	2	A Lazazzara, E Galanaki	E-HRM Adoption and Usage: A Cross-National Analysis of Enabling Factors	2018	Digital Technology and Organizational Change
15	66	P Dhamija	E-recruitment: a roadmap towards e-human resource management	2012	Researchers World
16	2	A Jain, A Goyal	E-recruitment & E-Human Resource Management Challenges in the Flat World: A Case Study of Indian Banking Industry (With Special Reference to ICICI Bank, Jaipur)	2014	International Journal of Scientific and Research Publications
17	2	S Singh	E-recruitment: A New Dimension of Human Resource Management in India	2017	International Journal
18	25	T Bondarouk, E Parry, E Furtmueller	Electronic HRM: four decades of research on adoption and consequences	2017	The International Journal of Human Resource Management
19	250	TV Bondarouk, HJM Ruël	Electronic Human Resource Management: challenges in the digital era	2009	The International Journal of Human Resource Management
20	95	DL Stone, JH Dulebohn	Emerging issues in theory and research on electronic human resource management (eHRM)	2013	Human Resource Management Review
21	67	DL Stone, KM Lukaszewski	An expanded model of the factors affecting the acceptance and effectiveness of electronic human resource management systems	2009	Human Resource Management Review
22	6	T Bondarouk, E Furtmueller	Electronic human resource management: Four decades of empirical evidence	2012	Academy of Management Proceedings
23	8	D Arjomandy	Social media integration in electronic human resource management: Development of a social eHRM framework	2016	Canadian Journal of Administrative Sciences
24	7	M Tate, E Furtmueller, PM Wilderom	Localising versus standardising electronic human resource management: complexities and tensions between HRM and IT departments	2013	European journal of International Management
25	5	YM Yusoff, T Ramayah	Electronic human resource management (e-HRM) and human resource (HR) competencies: some evidence from an emerging market	2012	International Journal of Information and Communication Technology
26	2	V Stein, TM Scholz	Electronic human resource management strategies for atypical employment, ICETE 2013-10th Int	2013	Joint Conf. on E-Business and Telecommunications
27	1	V Stein, TM Scholz	Electronic human resource management strategies for atypical employment	2013	International Conference on e-Business
28	0	N Berber, B Đorđević, S Milanović	Electronic human resource management (e-HRM): A new concept for digital age	2018	Strategic Management
29	116	I Lee	An architecture for a next-generation holistic e-recruiting system	2007	Communications of the ACM
30	129	SD Maurer, Y Liu	Developing effective e-recruiting websites: Insights for managers from marketers	2007	Business horizons
31	104	I Lee	The evolution of e-recruiting: A content analysis of Fortune 100 career web sites	2005	Journal of Electronic Commerce in Organizations
32	74	AD Smith, WT Rupp	Managerial challenges of e-recruiting: extending the life cycle of new economy employees	2004	Online Information Review
33	33	B Cullen	E-recruiting is driving HR systems integration	2001	Strategic Finance
34	26	JF Wolfswinkel, E Furtmueller, C Wilderom	Reflecting on E-Recruiting Research Using Grounded Theory.	2010	ECIS
35	37	I Lee	Modeling the benefit of e-recruiting process integration	2011	Decision Support Systems
36	30	S Lang, S Laumer, C Maier, A Eckhardt	Drivers, challenges and consequences of E-recruiting: a literature review	2011	Proceedings of the 49th SIGMIS annual conference on Computer personnel research
37	25	MT Thielsch, L Träumer, L Pytlik	E-recruiting and fairness: the applicant's point of view	2012	Information Technology and Management
38	24	A Eckhardt, S Laumer, C Maier	The transformation of people, processes, and IT in e-recruiting: Insights from an eight-year case study of a German media corporation	2014	Employee Relations
39	18	A Eckhardt, S Laumer, T Weitzel	Extending the architecture for a next-generation holistic e-recruiting system	2008	CONF-IRM 2008 Proceedings
40	17	RH Searle	Organizational justice in e-recruiting: Issues and controversies	2002	Surveillance & society
41	11	E Furtmueller, C Wilderom, R van Dick	Utilizing the lead user method for promoting innovation in e-recruiting	2009	Handbook of Research on E-Transformation and Human Resources Management Technologies: Organizational Outcomes and Challenges
42	15	A Eckhardt, T Weitzel, W Koenig, J Buschbacher	How to Convince People Who Don't Like IT to Use IT: A Case Study on E-Recruiting	2007	Americas Conference on Information Systems (AMCIS) 2007 Proceedings
43	10	E Furtmüller, C Wilderom, R Van Dick	Sustainable e-Recruiting portals: How to motivate applicants to stay connected throughout their careers?	2010	International Journal of Technology and Human Interaction

44	16	AJ Du Plessis, H Frederick	Effectiveness of e-recruiting: empirical evidence from the Rosebank business cluster in Auckland, New Zealand	2012	Science Journal of Business Management
45	13	S Laumer, A Eckhardt, T Weitzel	Status quo and trends in e-recruiting-Results from an empirical analysis	2009	International Conference on Information Resources Management (CONF-IRM) 2009 Proceedings
46	9	M Tate, E Furtmueller	Service development as action design research: reporting on a servitized e-recruiting portal	2012	Proceedings of SIGSVC Workshop. Sprouts: Working Papers on Information Systems
47	11	F Nirschl, M Fuchs, J Dorn	A Quantitative Competence Model for e-Recruiting and Team Building in Safety Critical Domains	2008	2008 IEEE International Technology Management Conference (ICE)
48	11	I Lee	An analytical model of e-recruiting investment decision: an economic employment approach	2005	IEEE Transactions on Engineering Management
49	10	A Eckhardt, S Laumer	An IT-architecture to align e-recruiting and retention processes	2009	International Journal of E-Services and Mobile Applications
50	9	I Lee	An integrated economic decision and simulation methodology for e-recruiting process redesign	2005	International Journal of Simulation and Process Modelling
51	7	JF Wolfswinkel	Reflecting on e-recruiting research: A systematic literature review	2009	11th Twente Student Conference on IT, Enschede, June 29th, 2009
52	7	I Lee	E-recruiting: Categories and analysis of Fortune 100 career web sites	2005	e-Human Resources Management: Managing Knowledge People
53	9	N Sharma	Recruitment Strategies: A power of E-Recruiting and Social Media	2014	International Journal Of Core Engineering & Management
54	4	NJ King	Is paperless hiring in your future?: E-recruiting gets less risky	2000	Employee Relations Law Journal
55	5	O Rosoiu, C Popescu	E-recruiting Platforms: Features that Influence the Efficiency of Online Recruitment Systems.	2016	Informatica Economica
56	5	IC Huang, PCF Tsai, YH Huang, CH Chen	Appeals of recruiting advertisement contents in e-recruiting: Job seekers' perspective	2003	Journal of Human Resource Management
57	4	K Rotella	The Joys of E-Recruiting	2000	Plumbing & Mechanical
58	4	BJ Cullen	Integrating e-Recruiting and HR Processes, Nicholas C. Burkholder, Preston J. Edwards Sr., and Libby Sartain	2004	On Staffing: Advice and Perspectives from HR Leaders
59	3	V Gateschi, F Lamberti, A Sanna, C Demartini	A Semantic Matchmaking System for e-Recruiting	2010	Proceedings of the I-KNOW, Graz
60	3	K Scanlon	Advances in E-Recruiting: Levering the jobs domain	2007	Society for Human Resource Management
61	2	WKB Abdessalem, S Amdouni	E-recruiting support system based on text mining methods	2011	International Journal of Knowledge and Learning
62	2	I Lee	E-Recruiting System Development and Architecture	2007	Utilizing and Managing Commerce and Services Online
63	2	I Lee	E-recruiting: Opportunities and challenges	2006	Information Management
64	1	E Furtmüller, C Wilderom, R van Dick	Sustainable e-Recruiting Portals: How to Motivate Applicants to Stay Connected throughout their Careers?	2010	International Journal of Technology and Human Interaction
65	1	J Heuer, G Truhlar	E-Recruiting: A Powerful Tool.	2003	CUPA-HR Journal
66	1	C Hollander	Advancing e-Recruiting Service Offering: Innovation through ICT	2010	13th Twente Student Conference on IT
67	1	H Ozuru, J Chikwe	Electronic recruiting (E-recruiting) strategy and corporate adoption in Nigeria	2015	European Journal of Business and Management
68	1	P Marlene	The power of e-recruiting	2000	Management Review
69	0	I Lee	E-Recruiting: Sources, Opportunities, and Challenges	2010	Encyclopedia of E-Business Development and Management in the Global Economy
70	1	TL Harrison, DL Stone	Understanding an E-recruiting Method: Aligning Website Features and Applicant Values	2015	Academy of Management Proceedings
71	0	T Harrison, DL Stone	Effects of organizational values and employee contact on e-recruiting	2018	Journal of Managerial Psychology
72	0	Y Sun, HC Chou, X Peng, G Guo, F Zhuâ€¦	An empirical study on influencing factors of enterprise recruiter's conditional brand choice of E-recruiting provider	2007	IEEE International Conference on Industrial Engineering and Engineering Management
73	0	CH Cho, JH Hyun	What e-SERVPERF in recruiting websites does affect users' perceived value, satisfaction, and revisit intention in Korea?	2016	Total Quality Management & Business Excellence
74	119	D Yoon Kin Tong	A study of e-recruitment technology adoption in Malaysia	2009	Industrial Management & Data Systems
75	105	LF Thompson, PW Braddy, KL Wuensch	E-recruitment and the benefits of organizational web appeal	2008	Computers in Human Behavior
76	108	H Sylva, ST Mol	E-recruitment: A study into applicant perceptions of an online application system	2009	International Journal of Selection and Assessment
77	62	Y Melanthiou, F Pavlou	The use of social network sites as an e-recruitment tool	2015	Journal of Transnational Management
78	60	E Faliagka, A Tsakalidis, G Tzimas	An integrated e-recruitment system for automated personality mining and applicant ranking	2012	Internet research
79	66	P Dhamija	E-recruitment: a roadmap towards e-human resource management	2012	Researchers World
80	68	S Selden, J Orenstein	Government E-• Recruiting Web Sites: The influence of e-recruitment content and usability on recruiting and	2011	International Journal of Selection and Assessment

			hiring outcomes in US state governments		
81	70	AB Holm	E-recruitment: towards an ubiquitous recruitment process and candidate relationship management	2012	German Journal of Human Resource Management
82	44	A García-Izquierdo, H Aguinis, P Ramos-Villagrasa	Science-practice gap in e-recruitment	2010	International Journal of Selection and Assessment
83	38	D Yoon Kin Tong, CN Sivanand	E-recruitment service providers review: International and Malaysian	2005	Employee relations
84	28	Evanthia Faliagka, Lazaros Iliadis, Ioannis Karydis, Maria Rigou, Spyros Sioutas, Athanasios Tsakalidis, Giannis Tzimas	On-line consistent ranking on e-recruitment: seeking the truth behind a well-formed CV	2014	Artificial Intelligence Review
85	37	K Kashi, C Zheng	Extending Technology Acceptance Model to the E-recruitment Context in I ran	2013	International Journal of Selection and Assessment
86	25	J Nickel, H Schaumburg	Electronic privacy, trust and self-disclosure in e-recruitment	2004	Proceeding CHI EA '04 CHI '04 Extended Abstracts on Human Factors in Computing Systems
87	30	N Allden, L Harris	Building a positive candidate experience: towards a networked model of e-recruitment	2013	Journal of Business Strategy
88	25	A Keramati, M Salehi	Website success comparison in the context of e-recruitment: An analytic network process (ANP) approach	2013	Applied Soft Computing
89	28	A Holm	The effect of e-recruitment on the recruitment process: Evidence from case studies of three Danish MNCs	2010	3d European Academic Workshop on Electronic Human Resource Management - Bamberg, Germany
90	22	J Malinowski, T Keim, T Weitzel	Analyzing the impact of IS support on recruitment processes: an E-recruitment phase model	2005	PACIS 2005 Proceedings
91	21	L Yahiaoui, Z BoufaÃ¯da, Y PriÃ©	Semantic Annotation of Documents Applied to E-recruitment.	2006	SWAP
92	21	VN Florea, M Badea	Acceptance of new Technologies in HR: E-recruitment in Organizations	2013	Proceedings of the European Conference on Information Management
93	17	S Pande	E-recruitment creates order out of chaos at SAT telecom: system cuts costs and improves efficiency	2011	Human Resource Management International Digest
94	18	V Radevski, F Trichet	Ontology-based systems dedicated to human resources management: an application in e-recruitment	2006	OTM Confederated International Conferences "On the Move to Meaningful Internet Systems"
95	12	D Pollitt	E-recruitment gets the Nike tick of approval	2005	Human Resource Management International Digest
96	17	J Wozniak	The use of gamification at different levels of e-recruitment	2015	Management Dynamics in the Knowledge Economy
97	18	K Ghazzawi, A Accoumeh	Critical success factors of the E-recruitment system	2014	Journal of Human Resources Management
98	12	MA Kumar, S Priyanka	A study on adoption of E-recruitment using Technology Acceptance Model (TAM) with reference to graduating students in universities in Bahrain	2014	Journal of Advance Research in Computer Science and Management Studies
99	19	A B. Holm	Institutional context and e-recruitment practices of Danish organizations	2014	Employee Relations
100	14	JJ Llorens	A model of public sector e-recruitment adoption in a time of hyper technological change	2011	Review of Public Personnel Administration
101	16	RM Othman, R Musa	E-recruitment practice: Pros and cons	2007	Public Sector ICT Management Review
102	14	Jacek Woźniak	On e-recruitment and four ways of using its methods	2014	Proceedings of the 8th International Scientific Conference "Business and Management"
103	11	MM Poorangi, S Razavi, N Rahmani	An Evaluation of the Effectiveness of E-recruitment Practices for SMEs in Malaysia	2011	International Conference on Innovation, Management and Service
104	13	A Tyagi	Effective talent acquisition through E-recruitment: A study	2012	International Journal of Multidisciplinary Management
105	14	M Sills	E-recruitment: A comparison with traditional recruitment and the influences of social media	2014	A qualitative and quantitative review
106	9	E Parry, S Tyson	What is the Potential of E-recruitment to Transform the Recruitment Process and the Role of the Resourcing Team?	2009	Handbook of Research on E-Transformation and Human Resources Management Technologies: Organizational Outcomes and Challenges
107	16	RK Brahmana, R Brahmana	What Factors Drive Job Seekers Attitude in Using E-recruitment?	2013	The South East Asian Journal of Management
108	11	NR Khan, M Awang, AM Ghouri	Impact of e-recruitment and job-seekers perception on intention to pursue the jobs	2013	Management & Marketing
109	11	PM Mareschal, JP Rudin	E-government versus e-business: A comparison of online recruitment in the public and private sectors	2011	The American Review of Public Administration
110	11	Shaha Alotaibi, Mourad Ykhlef	Job recommendation systems for enhancing e-recruitment process	2012	Proceedings of the International Conference on Information and Knowledge Engineering
111	10	E Faliagka, K Ramantas, AK Tsakalidis, M Viennas	An Integrated E-recruitment System for CV Ranking based on AHP.	2011	WEBIST
112	10	D Pollitt	E-recruitment helps Xerox to pick the cream of the crop	2004	Human Resource Management International Digest
113	14	A Kar, S Bhattacharya	E-recruitment and customer satisfaction: An empirical study in and around Kolkata	2009	IUP Journal of Management Research

114	12	T Minton-Eversole	E-recruitment comes of age, survey says	2007	HRMagazine
115	8	A Sanusi, AM Martadha	Public Sector Reforms and E-recruitment in Nigeria: Will Good Governance Count	2011	European Journal of Social Sciences
116	12	P Kaur	E-recruitment: A conceptual study	2015	International Journal of Applied Research
117	7	R Ramaabaanu, M Saranya	Importance and Problems of E-recruitment	2014	International Journal of Research
118	7	E Malherbe, M Cataldi, A Ballatore	Bringing order to the job market: Efficient job offer categorization in e-recruitment	2015	Proceedings of the 38th International ACM SIGIR Conference on Research and Development in Information Retrieval
119	9	N Khan, S Taha, A Ghouri	Bridging the gap through e-recruitment: Evidences from private employment sector in Karachi	2011	Indian Journal of Commerce & Management Studies
120	11	Cristina Simón, José Esteves	The limits of institutional isomorphism in the design of e-recruitment websites: a comparative analysis of the USA and Spain	2016	The International Journal of Human Resource Management
121	10	KM Dileep, M Ramesh	E-recruitment: Leveraging Technology towards Business Excellence	2009	Business Review
122	9	GMBED Aboul-Ela	Development of a scale to measure the perceived benefits of e-recruitment from the viewpoint of the recruiter.	2014	Journal of Business and Retail Management Research
123	10	MD Shahila, R Vijayalak	E-recruitment challenges	2013	International Journal of Social Science & Interdisciplinary Research
124	7	J Martinez-Gil	An overview of knowledge management techniques for e-recruitment	2014	Journal of Information & Knowledge Management
125	7	M Fayyazi, Z Afshar	E-recruitment in Iranian Bank and insurance industry.	2014	New Marketing Research Journal
126	7	Y Gupta	Literature review on e-recruitment: A step towards paperless HR	2016	International Journal
127	8	C Taylor	E-recruitment is powerful weapon in war for talent.	2001	People Management
128	7	S Ahmed, H Tahir, SW Warsi	E-recruitment Transforming the Dimensions of Online Job Seeking: A case of Pakistan	2015	International Journal of Human Resource Studies
129	9	N Sharma	Recruitment Strategies: A power of E-Recruiting and Social Media	2014	International Journal Of Core Engineering & Management
130	5	A Sanusi, AM Mohamed	Relationship between e-recruitment adoption and good governance practices in Nigerian public sector: An empirical study	2012	Journal of Public Administration and Governance
131	5	E Faliagka, M Rigou, S Sirmakessis	An e-recruitment system exploiting candidates' social presence	2015	International Conference on Web Engineering
132	4	A Lewis, L Daunton, B Thomas	A critical Exploration into whether E-recruitment is an Effective E-Entrepreneurship method in Attracting Appropriate Employees for Enterprises	2010	International Journal of E-Entrepreneurship and Innovation
133	5	C Bodea, V Bodea, M Zsolt	Human Resource Management in the Internet Age: E-recruitment and e-Selection Methods	2003	Economy Informatics
134	5	L Clark	Henkel rolls out e-recruitment across Europe	2006	Computer Weekly
135	5	O Rosoiu, C Popescu	E-recruiting Platforms: Features that Influence the Efficiency of Online Recruitment Systems.	2016	Informatica Economica
136	4	M Iannotta, M Gatti	Innovating e-recruitment services: an italian case study	2016	Empowering Organizations
137	12	Emmanuel Morin, Michel Leclère, Francky Trichet	The semantic web in e-recruitment	2004	The First European Symposium of Semantic Web
138	4	E Faliagka, I Karydis, M Rigou, S Sioutasâ€¦	Taxonomy development and its impact on a self-learning e-recruitment system	2012	International Conference on Artificial Intelligence Applications and Innovations
139	4	NR Khan	E-recruitment: a new way out for success	2011	Business Recorder, Retrieved Nov
140	4	D Hoffman	E-recruitment and the war for talent	2001	NAGCAS Connect Olivier
141	4	M Haroon, M Zia-ur-Rehman	E-recruitment: Across the small and large firms in Pakistan	2010	Interdisciplinary Journal of Contemporary Research in Business
142	3	AB Holm	E-recruitment: The Move towards a Virtually Organized Recruitment Process1	2012	Human Resource Management in the Digital Economy: Creating Synergy between Competency Models and Information
143	3	A Leftley	E-recruitment delivers return on investment for DML	2007	Strategic HR Review
144	3	Michel Tétreault, Aude Dufresne, Michel Gagnon	Development of an ontology-based e-recruitment application that integrates social web	2011	Electronic Business Interoperability: Concepts, Opportunities and Challenges
145	5	Z Malik, D Razaullah	The Role of E-recruitment Towards Attraction of Workforce: A Case of Telecom Sector Organization	2013	Abasyn University Journal of Social Sciences
146	3	R Radhika, F John	E-recruitmentâ€“an organizational change	2016	International Journal of Multidisciplinary Approach & Studies
147	4	D Monteiro, B Alturas	The adoption of E-recruitment: The Portuguese case: Study of limitations and possibilities by the point of view from candidates and from recruiters	2012	7th Iberian Conference on Information Systems and Technologies, Madrid, Spain
148	3	A Suerdem, B Oztaysi	Interdisciplinary collaboration of engineers and social researchers to face societal challenges: designing an e-recruitment system for disadvantaged groups	2015	Procedia-Social and Behavioral Sciences

149	3	H William	E-recruitment: Rethinking recruitment	2009	Personnel today survey
150	3	L SuhÃ¡nyi	E-recruitment in the Conditions of Slovak Republic	2011	TudomÃ¡nyos mozaik
151	3	L Randall	E-recruitment in Australia and New Zealand: An International Perspective	2004	International Human Resource Management Journal
152	3	M Week	E-recruitment in Web 2.0 boost.	2006	Marketing Week
153	3	K Ashok, S Priyanka	A Study on Adoption of E-recruitment Using Technology Acceptance Model (TAM) with reference to Graduating Students in University of Bahrain	2014	International Journal of Advance Research in Computer Science and Management Studies
154	3	MN Rakholiya, MC Gupta	A study on the Applicant's Perception towards E-recruitment	2013	International Multidisciplinary Journal of Applied Research
155	3	M Blickenstorfer	E-recruitment: Development and Trends	2006	Seminar Thesis
156	3	T Al-Otaibi Shaha, Y Mourad	Job Recommendation Systems for Enhancing E-recruitment Process	2013	Las Vegas Nevada
157	3	D Labanyi	E-recruitment services continue to prosper as more people go online to find a job	2002	The Irish Times
158	2	E Alabi, MA Afolabiâ€¦	Influence of E-recruitment on Organizational Performance in Nigeria	2015	Academic Conference of African Scholar Publications & Research International on Achieving Unprecedented Transformation in a fast-moving World
159	2	MM Poorangi, EWS Khin, N Rahmani	SMEs portfolio of E-recruitment: Malaysian perspective	2011	International Journal of e-Education, e-Business, e-Management and e-Learning
160	4	J Kuppusamy, J Ganesan	A Study of factors contributing towards the effectiveness of E-recruitment among generation Y job seekers	2016	International Journal of Advanced and Applied Sciences
161	2	T Otter, J Holincheck	Magic Quadrant for e-recruitment Software	2009	Gartner RAS Care Research Note G
162	3	N Khan, CB Senthilkumar	E-recruitment: Criteria for its effectiveness and modern trends	2015	International Journal of Business Administration and Management Research
163	3	B Hada, S Gairola	Opportunities & Challenges of E-recruitment	2015	Journal of Management Engineering and Information Technology
164	2	Y Chen, YM Dong, BJ Yang	Empirical study of individual acceptance behaviors in e-recruitment systems	2008	4th International Conference on Wireless Communications, Networking and Mobile Computing
165	2	L Khanam, MA Uddin, MA Mahfuz	Students' Behavioral Intention and Acceptance of E-recruitment System: A Bangladesh Perspective	2015	12th International Conference on Innovation and Management
166	2	A Narlusi	E-recruitment systems: A theoretical model	2015	DWU Research Journal
167	5	Oscar M. Salazar, Juan C. Jaramillo, Demetrio A. Ovalle, Jaime A. Guzmán	A case-based multi-agent and recommendation environment to improve the e-recruitment process	2015	International Conference on Practical Applications of Agents and Multi-Agent Systems
168	2	H Imam, SN Batool	Organizational perception regarding specific information about job and organization: An approach to E-recruitment	2013	International SAMNAM journal of business and social sciences
169	3	DG Amusan, MO Oyediran	Development of efficient e-recruitment system for university staff in Nigeria	2016	Circulation in Computer Science
170	5	YA Alsultanny, MF Alotaibi	Evaluating the Factors Affecting on Intension to Use of E-recruitment	2015	American Journal of Information Science and Computer Engineering
171	2	G Depardieu, P Islam	Efficient Talent Acquisition through E-recruitment	2008	Report of E-recruitment
172	2	LBD Castillo	E-recruitment websites ease firms' hiring woes	2002	??Business World
173	2	CM Yang, NY Shin, MW Weng, CH Hsu	Using a Two-Dimensional Mean Value Matrix (TDMVM) to Improve Users' Satisfaction with Government E-recruitment Website.	2015	JSW
174	3	MI ENĂ‚CHESCU	A Prototype for an E-recruitment Platform using Semantic Web Technologies	2016	Informatica Economica
175	2	S Nasreem, M Hassan, TA Khan	Effectiveness of e-recruitment in small and medium enterprises of IT industry of Lahore (Pakistan)	2016	Pakistan Economic and Social Review
176	2	NS Harinarayana, RN Vasantha	E-recruitment for library and information science professionals: A study of careerage. com job Portal	2007	Pearl: A Journal of Library and Information Science
177	2	J. Woźniak	On Evaluating E-recruitment Maturity with a Typology of Its Methods	2014	International Journal of Engineering Science and Innovative Technology
178	2	F Trichet, V Radevski	Competency-based Systems dedicated to E-recruitment	2006	??Proceedings of the 4th International Conference???
179	2	J Wozniak	About two explanations of effects of environmental engagement of a company on its attractiveness in an e-recruitment situation	2014	Proceedings of 8th International Scientific Conference “Business and Management”
180	2	LL Randell	E-recruitment in Australia and New Zealand	2004	IHRIM
181	2	AB Holm	The Effect of E-recruitment on The Recruitment Process: Evidence from Case Studies of The Danish MNCs	2010	International Journal
182	2	AG Faiyyaz	A Study of Recruitment Practices from Traditional to E-recruitment: A Paradigm Shift	2014	International Journal of Research in Commerce, IT & Management

183	2	R Ericca	E-recruitment: the effectiveness of the Internet as a recruitment source '	2007	Qut Eprint
184	2	Melanthiou, Y., Pavlou, F., & Constantinou, E.(2015).	The use of social network sites as an e-recruitment tool	2015	Journal of Transnational Management
185	2	P McCurry	Getting the best from e-recruitment	2005	Third Sector
186	2	T Minton-Eversole	E-recruitment Tools, Processes Come of Age.	2007	HR Magazine
187	2	J Nickel, H Schaumburg	Electronic privacy, trust and selfdisclosure in e-recruitment. In extended abstracts on Human factors in computing systems	2004	New York, USA
188	2	SL Lakshmi	E-recruitment: A boom to the organizations in the competitive world	2014	Journal of Business and Management
189	2	O Masese, M Uttam	Effectiveness of e-recruitment in organizational development	2016	Management and Economic Journal
190	2	AM AhmadS	Good Governance as a Yardstick to Measure the Effectiveness of E-recruitment in Nigerian Public Service	2012	Journal of US-China Public Administration
191	2	AL Garcia-Izquierdo, H Aguinis, PJ Ramos-Villagrasa	Science Research Gap in e-recruitment	2010	International Journal of Selection and Assessment
192	2	N Aloisa	E-recruitment systems: A theoretical model	2015	DWU Research Journal Contemporary PNG Studies
193	2	D Stover	E-recruitment: trial by wire	2003	Bio-IT World
194	2	N Paton	E-recruitment: does it work?	2002	Personnel Today, p20, 3p
195	4	A Lewis, B Thomas, S James	A critical analysis of the implementation of social networking as an e-recruitment tool within a security enterprise	2015	Cogent Business & Management
196	2	K Toteva, E Gourova	Social Network Analysis in Professional E-recruitment	2011	3rd International Conference on Software, Services and Semantic Technologies
197	1	N Rafeeq	E-recruitment implementation in Saudi Arabia	2010	Dissertation, University of Sheffield, United Kingdom
198	2	S Kumar, M Kaur	E-recruitment And Selection Process	2014	International Research Journal of Commerce Arts and Science
199	1	J Anand, D Chitra	The Impact of E-recruitment and challenges faced by HR Professionals	2016	International Journal of Applied Research
200	1	Yihong Zhan ; Hongxiu Li ; Weipeng Liao ; Shouxin Xia ; Ping Wang	A Proposed Model to Explore the Drivers for E-recruitment Adoption among Individual Jobseekers	2011	International Conference on Information Management, Innovation Management and Industrial Engineering
201	1	C Yu, D Yi-ming, Y Bao-jian	Empirical Study of Individual Acceptance Behaviors in E-recruitment Systems	2008	4th International Conference on Wireless Communications, Networking and Mobile Computing
202	1	TP Kumar, DS Lalitha	E-recruitment practices in Indian banking industry with special reference to Axis bank private limited in Guntur District	2016	International Journal of Technical Research & Science
203	1	S Mankikar, G Raturi	E-recruitment and selection approaches in Indian Pharmaceutical Industry: A Rationale	2014	International Journal of Management, IT and Engineering
204	2	A Jain, A Goyal	E-recruitment & E-Human Resource Management Challenges in the Flat World: A Case Study of Indian Banking Industry (With Special Reference to ICICI BankÂ â€¦	2014	International Journal of Scientific and Research Publications
205	1	R Venkatesh	Issues and challenges of E-recruitment in human resource management	2013	??International Journal of Management, IT and??
206	1	DM Liyanage, BL Galhena	Effect of E-recruitment on Behavioural Intention of Candidates: Empirical Evidence from Management Undergraduates in Sri Lanka	2014	International Journal of Human Resource Management and Research
207	1	MO Fred, UM Kinange	effectiveness of E-recruitment in organization development	2018	Management and Economic Journal
208	1	J WoÅºniak	On a typology of e-recruitment methods and its' consequences	2014	??Proceedings of The International Conference Global??
209	1	A Suerdem, B Oztaysi	Collaborative Requirement Prioritization for an E-recruitment Platform for Qualified but Disadvantaged Individuals	2016	Book: Knowledge, Information and Creativity Support Systems
210	1	R Almusa, W Albalawi	Using social media and CRM technology in e-recruitment	2016	Journal of Theoretical & Applied Information Technology
211	1	JKK Ho	A survey on the current status of e-recruitment adoption in Hong Kong	1813	American Research Thoughts
212	2	B Grobler, P Joubert, MK Lesuthu	Job Seekers' Perceptions about the PNet Website as an E-recruitment Tool within South Africa	2014	Mediterranean Journal of Social Sciences
213	1	P van Esch, M Mente	Marketing video-enabled social media as part of your e-recruitment strategy: Stop trying to be trendy	2018	Journal of Retailing and Consumer Services
214	0	M Fayyazi, Z Afshar	E-recruitment in Iran	2013	New Marketing Research Journal
215	0	C Nardone	Gender and e-recruitment: a comparative analysis between job adverts published for the German and Italian labour markets	2015	Corpus Linguistics 2015

216	0	D Buchnowska	Evaluation of e-recruitment level among the largest companies in Poland-project of research	2015	Contemporary Economy
217	0	HS Jatain	E-recruitment: The Effective Management of Identifying and Attracting Potential Human Resources	2014	Shikshan Anveshika
218	0	AZ KM, N Khan, CB Senthilkumar	E-recruitment: Criteria for its Effectiveness and Modern Trends	2015	International Journal of Business Adminstration and Management
219	0	BL Galhenaa, DM Liyanageb	Effect of e-recruitment on behavioural intention of candidates: Empirical evidence from management undergraduates in Sri Lanka	2014	Proceedings of the 3rd International Conference on Management and Economics
220	0	MN Reddy, T Mamatha, A Balaram	Analysis of E-recruitment Systems and Detecting E-recruitment Fraud	2018	International Conference on Communications and Cyber Physical Engineering
221	0	KR Archana, J George	E-recruitment strategies in emerging scenario	2016	Indian Journal of Arts
222	0	A Ramkumar	E-recruitment through Job Portals and Social Media Network: Challenges & Opportunities	2018	Indian Journal of Public Health
223	0	PM Mindia, MK Hoque	Effects of E-recruitment and Internet on recruitment process: An Empirical study on Multinational companies of Bangladesh	2018	International Journal of Scientific Research and Management
224	0	G Nabi, G Ghous, S Rahimiaghdam	Do we have sufficient literature on e-recruitment and selection	2017	ijecm.co.uk
225	0	S Amdouni, WBA Karaa, M Limam	E-recruitment and CV structuring	2010	MSDM'2010 MSDM'2010
226	0	P Sadhik	E-recruitment using social networking websites with reference to knowledge industry	2015	Trends, Challenges & Innovations in Management
227	0	H Zhang	E-recruitment Adoption among Chinese Job-Seekers	2018	KASEM BUNDIT JOURNAL
228	0	S Kumar, M Kaur	Cost-benefit analysis of E-recruitment	2014	academia.edu
229	0	RG Arora	Effectiveness of E-recruitment Practices: A Case Study of HSBC-GR.	2015	Amity Global HRM Review
230	0	U Schinzel	Impact of national culture on e-recruitment practices in Luxembourg	2016	World Review of Entrepreneurship, Management and Sustainable Development
231	0	RA Muthalif	E-recruitment challenges and issues of in India	2012	International Journal of Multidisciplinary Management Studies
232	0	AB Holm, L Haahr	E-recruitment and selection	2019	Digital Approaches, Directions & Applications
233	0	RP Harman, LF Thompson	E-recruitment	2012	Encyclopedia of Cyber Behavior
234	0	M Maree, AB Kmail, M Belkhatir	Analysis and shortcomings of e-recruitment systems: Towards a semantics-based approach addressing knowledge incompleteness and limited domain coverage	2018	Journal of Information Science
235	0	A Kumudha, C SaranyaPriyadarshini	A study on factors influencing perceptions of management students towards E-recruitment	2015	International Journal of Applied Research
236	0	SA Omolawal	Perceived infrastructural factors afffecting adoption of e-recruitment among Human Resource Management (HRM) practitioners in south-west Nigeria	2015	African Journal for the Psychological Studies of Social Issues
237	0	Anuskha, M., Muhammad Safizal Abdullah, Arman Hadi Abdul Manaf, Muhammad Asyraf, Mohd Kassim, Shahrul Nizam Salahuddin	Graduate Students'Perception towards E-recruitment	2017	Asian Journal of Social Sciences & Humanities
238	0	N Dhiman, N Arora	Adoption of E-recruitment Mobile Apps: A Study Based on UTAUT2 Framework	2018	Journal of Organisation & Human Behaviour
239	0	M Hafeez, U Farooq	The Role of E-recruitment in Attracting Potential Candidates: Evidence from Fresh Graduate Job Seekers	2017	International Conference On Advances In Business Management And Law
240	0	W Hong, S Zheng, H Wang	Dynamic Recommendation in E-recruitment System	2014	Control and Intelligent Systems
241	0	HC Wu	Design Science Framework for E-recruitment and Selection.	2016	PACIS
242	2	S Singh	E-recruitment: A New Dimension of Human Resource Management in India	2017	International Journal
243	0	Tangaza, Ibrahim Aminu; Mansor, Mohd Fitri Bin; Abu, Noor Hidayah; Nasir, Hussen	The Moderating Role of User Attitude on the Relationship Between Perceived Ease of Use and E-recruitment Adoption in Nigerian Civil Service: A Proposed Conceptual Framework	2017	Advanced Science Letters
244	1	J Anand, C Devi	Literature review on e-recruitment and its perceived benefits: A walk towards paperless HR	2016	International Journal of Applied Research
245	0	A Sanusi, AM Martadha	Good Governance as a Yardstick to Measure the Effectiveness of E-recruitment in Nigerian Public Service	2012	Journal of US-China Public Administration
246	0	R Patel	E-recruitment Challenges and Methods used in Modern Organization	2016	International Journal
247	0	KG Weerakoon, PN Gamage	Impact of Ownership Structure on E-recruitment Practices in Banks in Sri Lanka	2012	Global Journal of Enterprise Information System
248	0	PN Gamage	Impact of ownership structure on E-recruitment practices in banks in Sri Lanka	2013	South Asian Journal of Marketing & Management Research

249	0	Haddadi Lynda ; Tali Mohammed El Amine ; Bouarab-Dahmani Farida ; Berkane Tassadit	E-recruitment support system based on MOOCs	2017	International Conference on Mathematics and Information Technology
250	0	C Hipps	How to... run the perfect e-recruitment campaign	2008	People Management
251	0	B. Grobler, P. Joubert, Mr K. Lesuthu	Job seekers' perceptions about the PNet website as an E-recruitment tool within South Africa	2014	Mediterranean Journal of Social Sciences
252	1	Rasa Smaliukienė; Sergejus Trifonovas	E-recruitment in the military : challenges and opportunities for development	2012	Journal of security and sustainability issues
253	0	J Kaur	Analysis of E-recruitment and its relationship with attrition in modern organizations	2012	International Journal of Management, IT and Engineering
254	0	MS Nagi	A Conceptual Study on E-recruitment System and Its Efficiency in Indian MNC Companies	2017	Imperial Journal of Interdisciplinary Research
255	0	CO Daniel	E-recruitment and its Effects on Organizational Creativity and Innovation in Nigerian Manufacturing Firms	2018	Nile Journal of Business and Economics
256	3	K Wołodźko, J Woźniak	The Use by Large Polish Organizations of Information about CSR Activities in E-recruitment	2017	Economics & Sociology
257	0	A Allen	The wholesale shift to e-recruitment has deprived agencies of the big commissions they used to receive for printed adverts	2008	People Management
258	0	MS Malik, MA ul Mujtaba	Impact of E-recruitment on Effectiveness of HR Department in Private Sector of Pakistan	2018	International Journal of Human Resource Studies
259	0	AK Kebede	Adoption of E-recruitment in the Ethiopian Banking Industry	2017	IBMRD's Journal of Management & Research
260	0	MM Islam	Analysis of E-recruitment Trend and Effectiveness: A case study on some companies in Bangladesh	2016	Management
261	0	O Chenni, Y Bouda, H Benachour, C Zakaria	A Content-Based Recommendation Approach Using Semantic User Profile in E-recruitment	2015	International Conference on Theory and Practice of Natural Computing
262	0	A Van Looy	E-recruitment	2016	Social Media Management
263	0	C Nardone	Gender and e-recruitment: a comparative analysis between job advertisements published for the German and the Italian labour markets	2017	Labour & Law Issues
264	0	A Aajli, K Afdel	Towards a new approach of measure of skills applied to an adaptive assessments system used in E-Learning and E-recruitment	2013	ACS International Conference on Computer Systems and Applications
265	1	AB Holm	Institutional change as the determinant of adoption of e-recruitment practices	2012	Fourth International eHRM Conference
266	0	P Klubsri-on	Key Success Factors of E-recruitment	2015	Executive Journal
267	89	Philip W. Braddy, Lori Foster Thompson, Karl L. Wuensch, William F. Grossnickle	Internet recruiting: The effects of web page design features	2003	Social Science Computer Review
268	71	PA Hausdorf, D Duncan	Firm size and Internet recruiting in Canada: A preliminary investigation	2004	Journal of Small Business Management
269	63	RL Hogler, C Henle, C Bemus	Internet recruiting and employment discrimination: A legal perspective	1998	Human Resource Management Review
270	60	Braddy Phillip W., Meade Adam W., Michael Joan J., Fleenor John W.	Internet recruiting: Effects of website content features on viewers' perceptions of organizational culture	2009	International Journal of Selection and Assessment
271	38	CG Pearce, TL Tuten	Internet recruiting in the banking industry	2001	Business Communication Quarterly
272	32	M Zall	Internet recruiting	2000	Strategic Finance
273	25	BR Dineen, DG Allen	Internet recruiting 2.0: Shifting paradigms	2013	The Oxford handbook of recruitment
274	230	DC Feldman, BS Klaas	Internet job hunting: A field study of applicant experiences with on• line recruiting	2002	Human Resource Management
275	10	R Whiteside, GS Mentz	Online admissions and Internet recruiting: An anatomy of search engine placement	2003	Educause Quarterly
276	10	M Millar	Internet recruiting in the cruise industry	2009	Journal of Human Resources in Hospitality & Tourism
277	7	WJ Moon	The dynamics of Internet recruiting: An economic analysis	2007	issues in Political Economy
278	6	M Zall	More pros and cons to Internet recruiting	2000	HR focus
279	4	JR Arboledas, ML Ferrero, IS Vidal-Ribas	Internet recruiting power: opportunities and effectiveness	2001	University of Navarra, Spain
280	33	SF Gale	Internet recruiting: better, cheaper, faster.	2001	Workforce
281	4	J Dysart	New directions in Internet recruiting	2006	Contractor Magazine
282	3	R Ren, B Brewton	Leveraging 2.0 for Internet Recruiting	2010	Enterprise
283	2	HR Focus	Research demonstrates the success of Internet recruiting	2003	HR Focus
284	1	V Sharma	Modelling factors influencing employer for adoption of Internet recruiting: typology and determining factors	2011	Asia Pacific Business Review

285	0	C Holliday	Internet recruiting in the banking industry.(Technology)	2002	Technical Communication
286	0	KS Lee, SH Yoon	Implementation of Internet Recruiting Negotiation System using Multi Agents	2006	Journal of the Korea Society of Computer and Information
287	4	D Blank	Internet recruiting helps ease hiring woes.	2001	Hotel & Motel Management
288	3	R Schreyer, J McCarter	10+ steps to effective Internet recruiting.	1998	HR Focus
289	2	C Whaley	Virtually all companies will use Internet recruiting	2001	Computing Canada
290	1	TA Mobbs	Narrowing the digital divide: Employers and Internet recruiting	2003	LIMRA's marketFacts Quarterly
291	0	B Bellinger	Pluses and minuses for Internet recruiting.	1998	Electronic Engineering Times
292	0	BP Sunoo	Internet recruiting has its pros and cons.	1998	Workforce
293	231	D Bartram	Internet recruitment and selection: Kissing frogs to find princes	2000	International journal of selection and assessment
294	44	H Verhoeven, S Williams	Advantages and disadvantages of Internet recruitment: A UK study into employers' perceptions	2008	International review of business research papers
295	49	CK Gregory, AW Meade, LF Thompson	Understanding Internet recruitment via signaling theory and the elaboration likelihood model	2013	Computers in Human Behavior
296	28	M Veger	How does Internet recruitment have effect on recruitment performance?	2006	Fourth Twente Student Conference on IT
297	24	S Williams, H Verhoeven	We-find-you'or 'You-find-us': "Internet Recruitment and Selection in the United Kingdom	2008	International Review of Business Research Papers
298	19	Jessica M. Badger, Samuel E. Kaminsky and Tara S. Behrend	Media richness and information acquisition in Internet recruitment	2014	Journal of Managerial Psychology
299	12	WMY Teoh, SC Tan, SC Chong	Factors Influencing Perceptions of University Students Towards Internet Recruitment	2013	Asian Academy of Management Journal
300	17	GN Howardson, TS Behrend	Using the Internet to recruit employees: Comparing the effects of usability expectations and objective technological characteristics on Internet recruitment outcomes	2014	Computers in Human Behavior
301	10	F Suvankulov	Internet recruitment and job performance: case of the US Army	2013	The International Journal of Human Resource Management
302	5	MM Harris	Speeding down the information highway: Internet recruitment and testing	2003	The Industrial-Organizational Psychologist
303	9	X Li, W Shi, B Zhu	The face of Internet recruitment: Evaluating the labor markets of online crowdsourcing platforms in China	2018	Research & Politics
304	22	M Boydell	Internet recruitment helps HR careers	2002	Canadian HR Reporter
305	3	V Maarten	How Does Internet Recruitment have Effect on Recruitment Performance	2006	4th Twente Student Conference on IT, Enschede
306	2	A Zhefeng	Research Progress of Internet Recruitment at Hone and Abroad	2010	Journal of Shanghai Business School
307	1	Helen Verhoeven, Bal Chansarkar, Sue Williams	Convergence, Divergence or 'A Middle Way'? The influence of Culture on Internet Recruitment.	2009	International Review of Business Research Papers
308	0	W Xu, J Yu, C Chen	How Does Internet Recruitment Impact on New Hire Voluntary Turnover? A Theoretical study	2015	Association of Global Management Studies
309	0	O Flores, GW Stutes	Has Internet Recruitment of Workers Replaced Help Wanted Ads? Evidence from a Survey	2007	Journal of Economic Insight
310	0	GW Stutes	Has Internet Recruitment of Workers Replaced Help Wanted Ads'.	2007	Journal of Economics
311	0	PR Sparrow	Internet recruitment: reducing the barriers to international employment?	1999	Worldlink
312	0	MMAA Sayed	Internet recruitment sources: which is more informative, credible and safe?	2011	15th International Business Research Conference
313	3	R Campos, M Arrazola, J de Hevia	Finding the right employee online: determinants of Internet recruitment in Spanish firms	2018	Applied Economics
314	4	G Flynn	Internet Recruitment Limits Demographic Scope.	2000	Workforce
315	2	T Wagar, L Langrock	Small firms offline on Internet recruitment	2003	Canadian HR Reporter
316	101	PW Braddy, AW Meade, CM Kroustalis	Online recruiting: The effects of organizational familiarity, website usability, and website attractiveness on viewers' impressions of organizations	2008	Computers in Human Behavior
317	18	W Hong, L Li, T Li, W Pan	iHR: an online recruiting system for Xiamen Talent Service Center	2013	Proceedings of the 19th ACM SIGKDD international conference on Knowledge discovery and data mining
318	9	JA Odumeru	Diffusion of online recruiting technology in Nigeria	2012	Online Journal of Social Sciences Research
319	4	E Furtmueller-Ettinger, B Kijl	Service innovation in online recruiting	2009	IBIMA business review
320	4	E Parry, H Wilson	Online recruiting within the UK: a model of the factors affecting its adoption	2006	Proceedings of the First European Academic Workshop on Electronic Human Resource Management, Twente
321	4	R Bell, S Sutton	Building your online recruiting presence	1998	HUMAN RESOURCE PROFESSIONAL

322	4	MC Clement	Technology and Hiring: Online recruiting is a must these days, but it's just the first step in finding the right candidates for school district jobs	2006	American School Board Journal
323	2	YYLEI Li	Modeling the Factors Influencing College Students' Intentions to Participate in Online-Recruiting [J]	2006	Chinese Journal of Applied Psychology
324	2	P Cappali	Making the most of Online Recruiting	2001	Harvard Business Review
325	12	K Abraham, C Newcorn	Online Recruiting-A Powerful Tool for Small Businesses.	2000	National Public Accountant
326	5	O Rosoiu, C Popescu	E-recruiting Platforms: Features that Influence the Efficiency of Online Recruitment Systems.	2016	Informatica Economica
327	1	TS Behrend	Online recruiting and selection: Innovations in talent acquisition	2010	Personnel Psychology
328	0	XU Yan-bing	JSP-Based Online Recruiting System	2012	Computer Programming Skills & Maintenance
329	0	J Pont	ONLINE RECRUITING-The big boards' evolution-The" Big Three" job boards have recently announced changes that hint at new directions in theirÂ â€¦	2005	Workforce Management
330	0	JC Curcio	Online recruiting: A match made in cyber heaven.	2000	Caribbean Business
331	0	D Franz	Trends and tips for online recruiting and job hunts.	1999	Medical group management journal
332	0	L Pesante	Making the Most of Online Recruiting	2001	Technical Communication
333	0	J Kim	An Architecture and Software Process for the Development of Competence Oriented Online Recruiting Platform	2015	International Conference on Convergence Technology
334	0	G Calin, I Bivolaru, P Ivan	Comparative Analysis of the Online Recruiting Platforms using Utility-related Factors.	2016	Informatica Economica
335	0	G Gutmacher	10 proven online recruiting techniques	2000	Human Resource Professional
336	160	E Parry, S Tyson	An analysis of the use and success of online recruitment methods in the UK	2008	Human Resource Management Journal
337	135	E Parry, H Wilson	Factors influencing the adoption of online recruitment	2009	Personnel Review
338	97	V Liljander, ACR van Riel, M Pura	Customer satisfaction with e-services: the case of an online recruitment portal	2002	Electronic services
339	50	B Smyth, K Bradley, R Rafter	Personalization techniques for online recruitment services	2002	Communications of the ACM
340	51	K Bradley, B Smyth	Personalized information ordering: a case study in online recruitment	2003	Research and Development in Intelligent Systems
341	57	L Blommaert, M Coenders, F Van Tubergen	Discrimination of Arabic-named applicants in the Netherlands: An Internet-based field experiment examining different phases in online recruitment procedures	2013	Social forces
342	42	JPC Tong, VG Duffy, GW Cross, F Tsungâ€¦	Evaluating the industrial ergonomics of service quality for online recruitment websites	2005	International Journal of Industrial Ergonomics
343	32	PC Borstorff, MB Markerâ€¦	Online recruitment: Attitudes and behaviors of job seekers	2007	Journal of Strategic E - Commerce
344	37	P De Meo, G Quattrone, G Terracinaâ€¦	An XML-based multiagent system for supporting online recruitment services	2007	IEEE Transactions on Systems, Man, and Cybernetics - Part A: Systems and Humans
345	31	E Faliagka, K Ramantas, A Tsakalidis	Application of machine learning algorithms to an online recruitment system	2012	The Seventh International Conference on Internet and Web Applications and Services
346	23	RE Casper	Online recruitment	1985	Personnel Journal
347	13	Evanthia Faliagka, Lefteris Kozanidis, Sofia Stamou, Athanasios Tsakalidis, Giannis Tzimas	A personality mining system for automated applicant ranking in online recruitment systems	2011	International Conference on Web Engineering
348	15	E Parry	Drivers of the adoption of online recruitment-an analysis using diffusion of innovation theory	2008	E-HRM in theory and practice
349	11	PM Mareschal, JP Rudin	E-government versus e-business: A comparison of online recruitment in the public and private sectors	2011	The American Review of Public Administration
350	11	JM Antun, S Strick, L Thomas	Exploring culture and diversity for Hispanics in restaurant online recruitment efforts	2007	Journal of Human Resources in Hospitality & Tourism
351	8	D Pollitt	Online recruitment connects 3 with top talent	2008	Human Resource Management International Digest
352	8	Hamed Azad Moghaddam, Sajad Rezaei, Muslim Amin	Examining job seekers' perception and behavioural intention toward online recruitment: a PLS path modelling approach'	2015	Journal for Global Business Advancement
353	10	N Kumar, P Garg	Impact of online recruitment on recruitment performance	2010	Asian Journal of Management Research
354	7	Borstorff Patricia C, Marker Michael B, Bennett Doris S.	Online recruitment: Attitudes and behaviors of job seekers	2007	Journal of Strategic E - Commerce
355	8	Eeva-Liisa Oikarinen, Magnus Söderlund	The effects of humour in online recruitment advertising	2016	Australasian Marketing Journal
356	6	C Li, C Charron, S Roshan, GN Flemming	Online recruitment grows up	2002	Forrester Research

357	7	S Ahmed, H Tahir, SW Warsi	E-recruitment Transforming the Dimensions of Online Job Seeking: A case of Pakistan	2015	International Journal of Human Resource Studies
358	6	B Wang, X Guo	Online recruitment information as an indicator to appraise enterprise performance	2012	Online Information Review
359	7	Tania RoyChowdhury, M. Srimannarayana	Applicants' Perceptions on Online Recruitment Procedures	2013	Management and Labour Studies
360	6	Aseel B. Kmail, Mohammed Maree, Mohammed Belkhatir, Saadat M. Alhashmi	An automatic online recruitment system based on exploiting multiple semantic resources and concept-relatedness measures	2015	IEEE 27th International Conference on Tools with Artificial Intelligence
361	10	X Chen, M Liu, Y Zhou, Z Li, S Chen, X He	A truthful incentive mechanism for online recruitment in mobile crowd sensing system	2017	Sensors
362	5	O Rosoiu, C Popescu	E-recruiting Platforms: Features that Influence the Efficiency of Online Recruitment Systems.	2016	Informatica Economica
363	3	O Ibrahim, N Ithnin, NA Muslim	The Acceptance Behavior of Online Recruitment Users in Malaysia	2006	PACIS 2006 Proceedings
364	3	R Simeon	Comparative Analysis Of Online Recruitment And Managerial Capabilities	2002	International Business & Economics Research Journal
365	6	S Vidros, C Kolias, G Kambourakis	Online recruitment services: Another playground for fraudsters	2016	Computer Fraud & Security
366	3	J Hardy	Neoliberalism and Environmental Education: An Analysis of Australian Online Recruitment Advertisements.	2008	International Journal of the Humanities
367	3	HY Huang, C Pan, YM Hsieh	Factors influencing the user behaviour intention of online recruitment websites	2012	International Journal of Business and Commerce
368	3	B Amble	Employers turning away from online recruitment	2004	Management-issues
369	2	S McDonald, A Damarin	Black Holes & Purple Squirrels: Human Resource Recruitment and a Tale of Two Online Labor Markets	2015	Academy of Management Proceedings
370	2	C BrandÃ£o, R Silva, JV dos Santos	Online recruitment in Portugal: Theories and candidate profiles	2019	Journal of Business Research
371	2	Z Guanlian	Comparative Study of Old and New Online Recruitment Modes Based on Application and Development of Cloud Recruitment [J]	2013	Foreign Economic Relations & Trade
372	2	N Kumar, P Garg	Impact of Online Recruitment on Recruitment Performance	2010	Asian Journal of Management Research
373	2	JPC Tong, VG Duffy, GW Cross, F Tsung, B Yen	Evaluating the service quality of online recruitment websites: Comparing perceived overall service quality to measures of mental workload andÂ â€¦	2003	?? Human factors and ergonomicsÂ â€¦ ??
374	2	L Bloommaert, M Coenders, F Van Tubergen	Discrimination of Arabic-Named Applicants in the Netherlands: An Internet-Based Field Experiment Examining Different Phases in Online RecruitmentÂ â€¦	2014	Social Forces
375	2	DS Bennett, PC Borstoff, MB Marker	Online recruitment attitudes and behaviors of job seekers	2007	Journal of Strategic E-Commerce
376	2	P Cappelli	Making the Most of Online Recruitment	2001	Harvard Business Review
377	9	X Li, W Shi, B Zhu	The face of Internet recruitment: Evaluating the labor markets of online crowdsourcing platforms in China	2018	Research & Politics
378	1	X Chen, X Li, L Ruirui	New Thought of Online Recruitment in the Era of Big Data	2014	International Journal of Business and Social Science
379	1	Z Wang, X Tang, D Chen	A Resume Recommendation Model for Online Recruitment	2015	11th International Conference on Semantics, Knowledge and Grids
380	1	A Petre, C Osoian, M Zaharie	Applicants' perceptions on online recruitment	2016	Managerial Challenges of the Contemporary Society
381	3	S Vidros, C Kolias, G Kambourakis, L Akoglu	Automatic detection of online recruitment frauds: Characteristics, methods, and a public dataset	2017	Future Internet
382	1	Qiaoling Liu, Josh Chao, Thomas Mahoney, Alan Chern, Chris Min, Faizan Javed, Valentin Jijkoun	Lessons learned from developing and deploying a large-scale employer name normalization system for online recruitment	2018	Proceedings of the 24th ACM SIGKDD International Conference on Knowledge Discovery & Data Mining
383	0	X LI, X SUN	Online Recruitment Issues of College Graduates	2009	Journal of Shanxi Economic Management Institute
384	0	L Xi	Selection of Profit Model of Online Recruitment Based on SWOT Analysis	2012	Value Engineering
385	0	B SU, L LI	Development of Online Recruitment System Based on ASP	2008	Modern Computer
386	0	Y Ming	Analysis and Implementation of Key Technologies in E-Business Talent Online Recruitment Platform	2017	International Conference on Smart Grid and Electrical Automation
387	0	Z HUANG, Q LU, Z CAI	Design and Implementation of Online Recruitment System Based on ASP .NET	2009	Modern Computer
388	0	NA Mahmood, NF Ling	Theoretical Framework for Factors Influencing JobSeekers' Intention to Use Online Recruitment Websites	2017	International Journal of Academic Research in Business and Social Sciences
389	0	N Sultana, N Sultana	Analyzing the Effectiveness of Online Recruitment: A Case Study on Recruiters of Bangladesh	2017	Asian Business Review
390	4	Catarina Brandão, Cristina Morais, Sara Dias, Ana Rita Silva, Rosa Mário	Using Online Recruitment: Implicit Theories and Candidates' Profile	2017	World Conference on Information Systems and Technologies
391	0	L Jia	The Implementation of Online Recruitment System Based on ASP Technology	2007	Computer Study

392	1	S Silva, C Silva, D Martins	Online Recruitment for Organizational Knowledge Management: A Quantitative Study	2017	European Conference on Knowledge Management
393	0	D Xiaodong	Development of Online Recruitment and Management System	2010	Computer Programming Skills & Maintenance
394	0	C Jun	Application of Apriori algorithm in online recruitment system	2012	Electronic Design Engineering
395	1	TN Khan	Evaluating Saudi Corporate Companies Online Recruitment	2017	Journal of Business Theory and Practice
396	2	P Puncheva-Michelotti, S Hudson, G Jin	Employer branding and CSR communication in online recruitment advertising	2018	Business Horizons
397	3	R Campos, M Arrazola, J de Hevia	Finding the right employee online: determinants of Internet recruitment in Spanish firms	2018	Applied Economics
398	10	C Gabarre, S Gabarre	Criteria for successfully recruiting online peer-tutors in foreign languages	2012	Asia Pacific Journal of Education
399	101	PW Braddy, AW Meade, CM Kroustalis	Online recruiting: The effects of organizational familiarity, website usability, and website attractiveness on viewers' impressions of organizations	2008	Computers in Human Behavior
400	0	VP Bresfelean, O Veres, C Bologa	Competencies and online recruiting for banking occupations	2010	Proceedings of the 2010 International Conference on Communication and Management in Technological Innovation and Academic Globalization
401	0	D LI, P QUAN	MIS of Recruiting on the Internet Based on Web	2005	Journal of Wuyi University (Natural Science Edition)
402	8	D Pollitt	Online recruitment connects 3 with top talent	2008	Human Resource Management International Digest
403	7	N Mwasha	An Over-view of Online Recruitment: The Case of Public and Private Sectors in Tanzania	2013	European Journal of Business and Management
404	2	MM Bigelow	Recruitment online: Reinventing the process	1999	Ohio CPA Journal
405	9	X Li, W Shi, B Zhu	The face of Internet recruitment: Evaluating the labor markets of online crowdsourcing platforms in China	2018	Research & Politics
406	7	S Ahmed, H Tahir, SW Warsi	E-recruitment Transforming the Dimensions of Online Job Seeking: A case of Pakistan	2015	International Journal of Human Resource Studies
407	3	O Ibrahim, N Ithnin, NA Muslim	The Acceptance Behavior of Online Recruitment Users in Malaysia	2006	PACIS 2006 Proceedings
408	3	R Simeon	Comparative Analysis Of Online Recruitment And Managerial Capabilities	2002	International Business & Economics Research Journal
409	2	C BrandÃ£o, R Silva, JV dos Santos	Online recruitment in Portugal: Theories and candidate profiles	2019	Journal of Business Research
410	1	X Chen, X Li, L Ruirui	New Thought of Online Recruitment in the Era of Big Data	2014	International Journal of Business and Social Science
411	1	S Silva, C Silva, D Martins	Online Recruitment for Organizational Knowledge Management: A Quantitative Study	2017	European Conference on Knowledge Management
412	0	N Sultana, N Sultana	Analyzing the Effectiveness of Online Recruitment: A Case Study on Recruiters of Bangladesh	2017	Asian Business Review
413	20	D Kraichy, DS Chapman	Tailoring web-based recruiting messages: Individual differences in the persuasiveness of affective and cognitive messages	2014	Journal of Business and Psychology
414	4	D Cohen	Web-based recruiting and staffing	2001	Web-based human
415	1	JN Mottl	Employers head to the web: Web-based recruiting and employment sites	1998	InternetWeek
416	2	?? AO Afolabi, O Oyeyipo ??	Construction professionals' perception of web-based recruiting system for skilled labour	2018	Journal of Theoretical and Applied Information Technology
417	350	BR Dineen, SR Ash, RA Noe	A Web of applicant attraction: person-organization fit in the context of Web-based recruitment.	2002	Journal of Applied Psychology
418	369	DG Allen, RV Mahto, RF Otondo	Web-based recruitment: Effects of information, organizational brand, and attitudes toward a Web site on applicant attraction.	2007	Journal of Applied Psychology
419	122	G Van Hoye, F Lievens	Investigating web based recruitment sources: Employee testimonials vs word • of mouse	2007	International Journal of Selection and Assessment
420	110	BR Dineen, RA Noe	Effects of customization on application decisions and applicant pool characteristics in a web-based recruitment context.	2009	Journal of Applied psychology
421	44	JJ Llorens, JE Kellough	A revolution in public personnel administration: The growth of web-based recruitment and selection processes in the federal service	2007	Public Personnel Management
422	50	KH Ehrhart, DM Mayer, JC Ziegert	Web-based recruitment in the Millennial generation: Work life balance, website usability, and organizational attraction	2012	European Journal of Work and Organizational Psychology
423	4	D Allen, R Otondo	Web-Based Recruitment: Effects of Information, Organizational brand and Attitudes Toward a Web Site on Aplicant Attraction	2008	Journal of Applied Psycology
424	3	F Lievens, MM Harris	Web-based recruitment and testing	2003	International review of industrial and organizational psychology
425	2	G David, V Raj, F Robert	Web-based recruitment	2007	Journal of Applied Psychology

426	127	BJ Jansen, KJ Jansen, A Spink	Using the web to look for work: Implications for online job seeking and recruiting	2005	Internet research
427	4	CB Goldberg, DG Allen	Web recruiting: Can organizations level the playing field for minority job seekers	2008	Human Resource Management
428	18	Peg Thoms, Jana Goodrich, Susan J. Chinn, Gary Howard	Designing personable and informative job recruiting web sites: Testing the effect of the design on attractiveness and intent to apply	2004	Psychological Reports
429	3	E White	Theory and practice: Employers are putting new face on web recruiting	2007	The Wall Street Journal
430	2	MY Lee	Effective Web Recruiting Takes Planning	1999	Crain's Cleveland Business
431	1	S Ahmed, A Adams	Web recruiting in government organizations: A Case Study of the Northern Kentucky/Greater Cincinnati Metropolitan Region	2010	Public Performance & Management Review
432	1	K Pearsall	Web recruiting complicated by sheer numbers.	1998	Computing Canada
433	168	Dineen Brian R., Ling Juan, Ash Steven R., DelVecchio Devon	Aesthetic properties and message customization: Navigating the dark side of web recruitment.	2007	Journal of Applied Psychology
434	72	BD Lyons, JH Marler	Got image? Examining organizational image in web recruitment	2011	Journal of managerial psychology
435	350	BR Dineen, SR Ash, RA Noe	A Web of applicant attraction: person-organization fit in the context of Web-based recruitment.	2002	Journal of Applied Psychology
436	110	BR Dineen, RA Noe	Effects of customization on application decisions and applicant pool characteristics in a web-based recruitment context.	2009	Journal of Applied psychology
437	86	H.Jack Walker, Hubert S.Feild, William F.Giles, Jeremy B.Bernerth, Jeremy C.Short	So what do you think of the organization? A contextual priming explanation for recruitment Web site characteristics as antecedents of job seekers' organizational image perceptions	2011	Organizational Behavior and Human Decision Processes
438	44	JJ Llorens, JE Kellough	A revolution in public personnel administration: The growth of web-based recruitment and selection processes in the federal service	2007	Public Personnel Management
439	46	David G. Allen, Jonathan E. Biggane, Mitzi Pitts, Robert Otondo, James Van Scotter	Reactions to recruitment web sites: Visual and verbal attention, attraction, and intentions to pursue employment	2013	Journal of Business and Psychology
440	10	S Markey, LC Liu, KS Koong	Some observations on web-based recruitment by selected Fortune 500 companies	2000	Proceedings of Information Systems Education Conference
441	2	MJ Parzinger, SG Ward, M Langford	Web Recruitment: Impact of Aesthetics and Playfulness on User's Initial Affective Reactions as it Relates to Applicant Attraction	2013	Proceedings of the Conference for Information Systems Applied Research
442	5	E Aureli, DF Iezzi	Recruitment via web and information technology: a model for ranking the competences in job market	2006	Proceedings of JADT 2006
443	3	MI ENĂ,CHESCU	A Prototype for an E-recruitment Platform using Semantic Web Technologies	2016	Informatica Economica
444	0	LEI Lin, C Xiu-yuan, LI Ting	Research on Web Recruitment System with Communication and Intelligence	2013	Value Engineering
445	0	WXZ Xiaoluan	Research on Named Entity Recognition in Web Recruitment Information Extraction	2012	Computer & Digital Engineering

vi. Top Ranking Journals in Random Order

1. Communications of the ACM
2. Decision Support Systems
3. European Journal of Information Systems
4. Information & Management
5. Information Systems Journal
6. Information Systems Research
7. Journal of Information Technology
8. Journal of Management Information Systems
9. Journal of Strategic Information Systems
10. Journal of the Association for Information Systems
11. MIS Quarterly
12. Behaviour and IT
13. British Journal of Educational Technology
14. Computers & Education
15. Database for Advances in Information Systems
16. Electronic Commerce Research and Applications
17. Electronic Journal of IS in Developing Countries
18. Electronic Markets
19. e-Service Journal
20. IBM Systems Journal
21. Information & Software Technology
22. Information & Organisation
23. Information Processing & Management
75. Journal of Community Informatics
76. Journal of Electronic Commerce in Organisations
77. Journal of Electronic Commerce Research
78. Journal of Intelligent Information Systems
79. Journal of Research and Practice in Information Technology
80. Journal of Software Maintenance and Evolution - Research and Practice
81. Knowledge and Information Systems
82. Online Information Review
83. Perspectives in Education
84. Project Management Journal
85. Social Dynamics
86. Social Science Computer Review
87. Social Science Information
88. Software Quality Journal
89. Software Testing Verification and Reliability
90. South African Journal of Business Management
91. System Dynamics Review
92. Systemic Practice and Action Research
93. Systems Research and Behavioural Science
94. Technovation
95. Telecommunications Policy
96. World Development

24. Information Research
25. The Information Society
26. Information Systems
27. Information Systems Frontiers
28. Information Systems Management
29. Information Technology & Management
30. Information Technology & People
31. Information Technology for Development
32. International Journal of Electronic Commerce
33. International Journal of Human-Computer Studies
34. International Journal of Information Management
35. International Journal of Technology Management
36. Internet Research
37. Journal of Database Management
38. Journal of Engineering and Technology Management
39. Journal of Global Information Management
40. Journal of Global Information Technology Management
41. Journal of Organisational Computing and Electronic Commerce
42. Journal of Systems and Software
43. Journal of the ACM
44. Knowledge-based Systems
45. MIS Quarterly Executive
46. Australasian Journal of Educational Technology
47. Behaviour & Information Technology
48. Canadian Journal of Administrative Sciences
49. Computer Fraud & Security
50. Computer Standards and Interfaces
51. Computers & Security
52. Computers in Human Behaviour
53. Educational Technology and Society
54. Electronic Journal of Information Systems Evaluation
55. Electronic Library
56. Enterprise Information Systems
57. Government Information Quarterly
58. IEEE Transactions On Professional Communication
59. IEICE Transactions on Information Systems
60. Industrial Management & Data Systems
61. Information Systems & E-business Management
62. Interacting with Computers
63. International Journal of African Renaissance Studies
64. International Journal of Cooperative Information Systems
65. International Journal of Electronic Government Research
66. International Journal of Human-Computer Interaction
67. International Journal of Information Security
68. International Journal of Information Technology and Decision Making
69. International Journal of Mobile Communications
70. International Journal of Project Management
71. International Journal of Software Engineering and Knowledge Engineering
72. International Journal of Systems Science
73. International Small Business Journal
74. Investment Analysts
97. World Wide Web: Internet and Web Information Systems
98. Academy of Management Annals
99. Journal of Human Resources
100. International Organization
101. Annual Review of Organizational Psychology and Organizational Behavior
102. Personnel Psychology
103. Organization Science
104. Journal of Organizational Behavior
105. Journal of Service Research
106. Leadership Quarterly
107. Organizational Behavior and Human Decision Processes
108. Organizational Psychology Review
109. Organization and Environment
110. Organization Studies
111. Industrial and Labor Relations Review
112. Work, Aging and Retirement
113. Journal of Vocational Behavior
114. Review of International Organizations
115. Accounting, Organizations and Society
116. Academy of Management Learning and Education
117. Review of Public Personnel Administration
118. Journal of Law, Economics, and Organization
119. Human Resource Management
120. Journal of Occupational and Organizational Psychology
121. Work and Occupations
122. Group and Organization Management
123. Sport Management Review
124. Journal of Economic Behavior and Organization
125. European Journal of Work and Organizational Psychology
126. Human Resource Management Review
127. Work, Employment and Society
128. British Journal of Industrial Relations
129. Labour Economics
130. Journal of Sport Management
131. Human Resource Management Journal
132. Industrial Relations
133. Career Development and Transition for Exceptional Individuals
134. European Journal of Industrial Relations
135. IZA Journal of Labor Economics
136. Information and Organization
137. Journal of Economic Inequality
138. Public Relations Review
139. Journal of Career Assessment
140. Gender, Work and Organization
141. International Journal of Human Resource Management
142. Cross Cultural and Strategic Management
143. Human Performance
144. Journal of Pension Economics and Finance
145. Economic and Industrial Democracy
146. Journal of Leadership and Organizational Studies
147. International Journal of Selection and Assessment
148. South African Journal of Information Management,
149. South African Journal of Human Resource Management
150. Electronic Journal of Information Systems in Developing Countries